09/ 943,037

Enter NEWS followed by the item number or name to see news on that specific topic.

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* * * * * * * * * * * * * * STN Columbus * * * * * * * * * * * * * * * *

FILE 'HOME' ENTERED AT 12:04:10 ON 04 MAY 2003

=> file reg

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	0.21	0.21

FILE 'REGISTRY' ENTERED AT 12:04:16 ON 04 MAY 2003
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Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 2 MAY 2003 HIGHEST RN 509953-09-7
DICTIONARY FILE UPDATES: 2 MAY 2003 HIGHEST RN 509953-09-7

TSCA INFORMATION NOW CURRENT THROUGH JANUARY 6, 2003

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details:
http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

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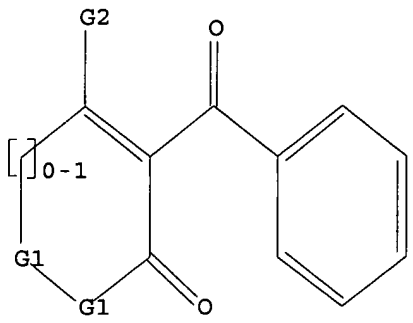
Uploading 09943037.str

L1 STRUCTURE UPLOADED

=> d l1
L1 HAS NO ANSWERS
L1 STR



G1 C,O,S,N

G2 O,S,X,CN

Structure attributes must be viewed using STN Express query preparation.

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SAMPLE SEARCH INITIATED 12:04:37 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -   4181 TO ITERATE

 23.9% PROCESSED    1000 ITERATIONS                          26 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:  ONLINE  **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS:        79744 TO    87496
PROJECTED ANSWERS:            1549 TO     2799

L2            26 SEA SSS SAM L1

=> s l1 ful
FULL SEARCH INITIATED 12:04:42 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -  83156 TO ITERATE

100.0% PROCESSED   83156 ITERATIONS                      2122 ANSWERS
SEARCH TIME: 00.00.01

L3          2122 SEA SSS FUL L1

=> file caplus
COST IN U.S. DOLLARS                        SINCE FILE      TOTAL
                                               ENTRY    SESSION
FULL ESTIMATED COST                           148.15     148.36

FILE 'CAPLUS' ENTERED AT 12:04:48 ON 04 MAY 2003
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
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FILE COVERS 1907 - 4 May 2003 VOL 138 ISS 19
FILE LAST UPDATED: 2 May 2003 (20030502/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

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=> s l3
L4          326 L3

=> s l3/arg
            326 L3
         100408 ARG/RL
L5             2 L3/ARG
                   (L3 (L) ARG/RL)

=> d l5 1- ibib abs hitstr
YOU HAVE REQUESTED DATA FROM 2 ANSWERS - CONTINUE? Y/(N):y

L5   ANSWER 1 OF 2  CAPLUS  COPYRIGHT 2003 ACS
ACCESSION NUMBER:         2001:78372  CAPLUS
DOCUMENT NUMBER:          134:131520
TITLE:                    Preparation of isoxazolyl- and isoxazolinyl-
                          substituted benzoylcyclohexanediones as herbicides
INVENTOR(S):              Willms, Lothar; Van Almsick, Andreas; Bieringer,
                          Hermann; Auler, Thomas; Thurwachter, Felix
PATENT ASSIGNEE(S):       Aventis Cropscience G.m.b.H., Germany
SOURCE:                   PCT Int. Appl., 74 pp.
                          CODEN: PIXXD2
DOCUMENT TYPE:            Patent
LANGUAGE:                 German
FAMILY ACC. NUM. COUNT:   1
PATENT INFORMATION:

     PATENT NO.        KIND  DATE           APPLICATION NO.  DATE
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     WO 2001007422      A1   20010201       WO 2000-EP6722   20000714
         W:  AE, AG, AL, AM, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CN, CR, CU,
             CZ, DM, DZ, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR,
             KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, PL, RO,
             RU, SG, SI, SK, TJ, TM, TR, TT, UA, UZ, VN, YU, ZA, AM, AZ, BY,
             KG, KZ, MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY,
             DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ,
             CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
     DE 19935218        A1   20010201       DE 1999-19935218 19990727
     BR 2000012782      A    20020430       BR 2000-12782    20000714
     EP 1202978         A1   20020508       EP 2000-949340   20000714
         R:  AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
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     JP 2003505452      T2   20030212       JP 2001-512507   20000714
     US 6211216         B1   20010403       US 2000-625370   20000725
     BG 6330            A    20020930       BG 2002-6330     20020121
     BG 106330          A    20020930       BG 2002-106330   20020121
PRIORITY APPLN. INFO.:                    DE 1999-19935218 A  19990727
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OTHER SOURCE(S):          CASREACT 134:131520; MARPAT 134:131520
GI
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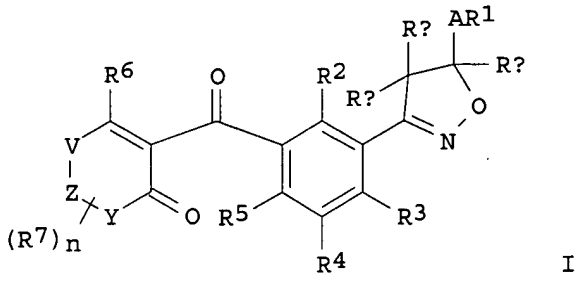

I

AB Title compds. [I; A = (unsatd.) (O-, S-, or CO-interrupted) (alkyl-, alkoxy, OH-substituted) alkyl; R1 = OR11, SR11, SOR11, SO2R11, CO2R8, CONR8R9, etc.; R8, R9 = H, alkyl, etc.; R11 = alkenyl, alkynyl, cycloalkyl, etc.; or AR1 = (substituted) heteroaryl or heterocyclyl; Ra, Rb, Rc = H, (substituted) alkyl, OR11, SR11, etc.; or RaRb = bond; R2, R3, R4, R5 = H, alkyl, alkenyl, etc.; R6 = OR10, alkylthio, halogenalkylthio, etc.; R10 = R11; R7 = H, tetrahydropyran-3-yl, etc.; Y = O, S, NH, NA, C(R7)2; A = alkyl; Z = O, S, SO, SO2, NH, N-alkyl, C(R7)2; V = (CH2)v; v = 0-1; n = 0-4] were prepd. as herbicides and plant growth regulators (no data). Thus, 2-chloro-3-(5-methoxymethylisoxazol-3-yl)-4-methylsulfonylbenzoate (prepd. from 2,6-dichlorotoluene) was stirred with 1,3-cyclohexanedione and DCC in CH2Cl2 for 16 h. The resulting 3-oxo-1-cyclohexenyl deriv. was treated with Et3N and Me2C(OH)CN in MeCN to give after 16 h 100% [2-chloro-3-(5-methoxymethylisoxazol-3-yl)-4-methylsulfonylbenzoyl]cyclohexane-1,3-dione. Several I at 600-800 ppm preemergent and postemergent gave 80-100% control of Stellaria media, Lolium multiflorum, Amaranthus retroflexus, Setaria viridis, Sinapis arvensis, etc.

IT **321854-09-5P 321854-10-8P 321854-11-9P**
321854-12-0P 321854-13-1P 321854-14-2P
321854-15-3P 321854-16-4P 321854-17-5P
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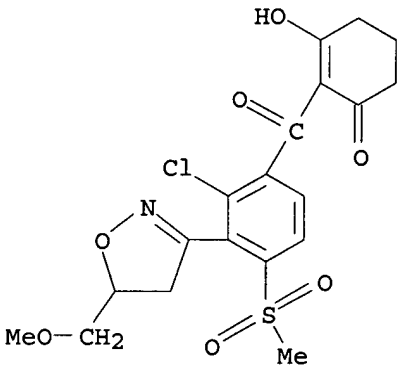
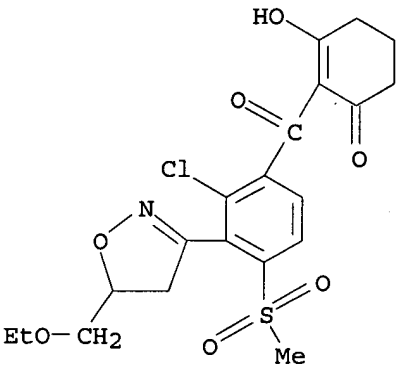
321855-31-6P 321855-32-7P 321855-33-8P
RL: **ARG (Analytical reagent use)**; BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); ANST (Analytical study); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of isoxazolyl- and isoxazolinyl-substituted benzoylcyclohexanediones as herbicides)

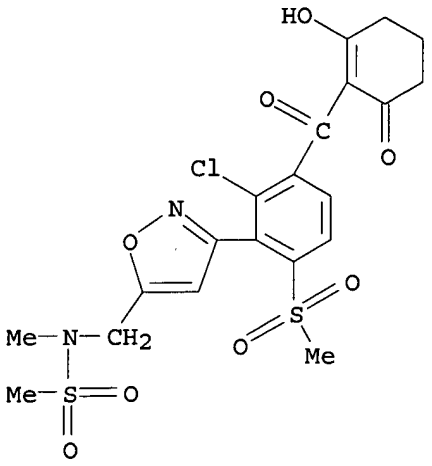
RN 321854-09-5 CAPLUS
CN 2-Cyclohexen-1-one, 2-[2-chloro-3-[4,5-dihydro-5-(methoxymethyl)-3-isoxazolyl]-4-(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



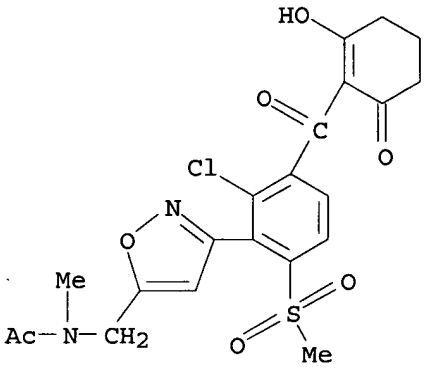
RN 321854-10-8 CAPLUS
CN 2-Cyclohexen-1-one, 2-[2-chloro-3-[5-(ethoxymethyl)-4,5-dihydro-3-isoxazolyl]-4-(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



RN 321854-11-9 CAPLUS
CN 2-Cyclohexen-1-one, 2-[2-chloro-3-[4,5-dihydro-5-(propoxymethyl)-3-isoxazolyl]-4-(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



RN 321855-33-8 CAPLUS
CN Acetamide, N-[[3-[2-chloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]-6-(methylsulfonyl)phenyl]-5-isoxazolyl]methyl]-N-methyl- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 2 OF 2 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1995:772622 CAPLUS
DOCUMENT NUMBER: 123:169649
TITLE: Preparation of 4-heterocyclylthio-3-benzoyl-bicyclo[3.2.1]oct-3-en-2-one derivatives and related compounds as herbicides
INVENTOR(S): Komatsubara, Kenichi; Koyanagi, Hiroshi; Sato, Tadashi; Yamada, Juji
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 23 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 07082240	A2	19950328	JP 1993-249693	19930913

PRIORITY APPLN. INFO.: JP 1993-249693 19930913

09/ 943,037

OTHER SOURCE(S): MARPAT 123:169649

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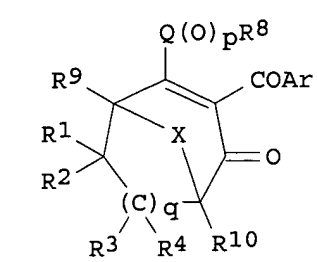

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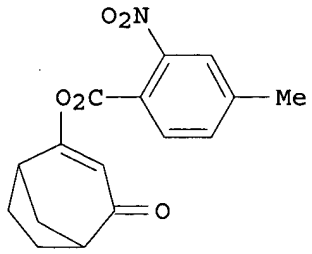

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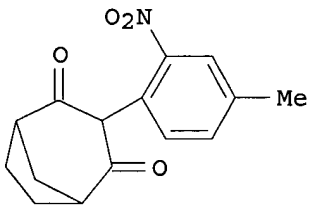

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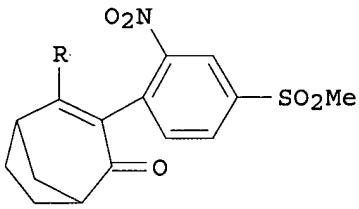

IV

AB The title compds. [I; X = O, S, C1-4 alkylene; Q = S, O; R1 - R4, R9, R10 = H, C1-8 alkyl, CO2H, C1-8 alkoxycarbonyl; Ar = (un)substituted Ph, substituted pyridyl; R8 = (un)substituted 5- or 6-membered ring heterocyclyl or fused heterocyclyl contg. .gtoreq.1 of N, O, and S in the ring; p, q = 0,1,2] are prepd. A herbicide, in particular for a cultivated field, contains 1 or .gtoreq.2 I as the active ingredients. A method for controlling the growth of undesired plants involves applying an herbicidally effective quantity of said compd. I to a location in which such a plant control is desired. Thus, a soln. of 19.1 g 2-nitro-4-methylsulfonylbenzoyl chloride in CH2Cl2 was added to a soln. of 10 g bicyclo[3.2.1]octane-2,4-dione in CH2Cl2 under ice-cooling and the resulting mixt. was stirred under ice-cooling for 1 h to give an enol ester (II) (25.2 g), which was dissolved in MeCN followed by adding 20 mL Et3N and 4.3 mL acetone cyanohydrin and the resulting mixt. was stirred at room temp. overnight to give 71.8% intermediate (III). III (25.0 g) was dissolved in CH2Cl2 and treated with oxalyl chloride and a few drops of DMF followed by stirring the mixt. for .apprx.30 min, refluxing it for 2 h, and evapg. solvent and the excess oxalyl chloride to give a chloride (IV; R = Cl), which was dissolved in THF and successively treated with 10.4 g 2-mercaptobenzoxazole and 13.0 mL Et3N followed by stirring the resulting mixt. for 3-4 h at room temp. to give, after workup, 77.5% IV (R = benzoxazol-2-ylthio). IV (R = pyrimidin-2-ylthio) at 250 g/ha in foliar application completely controlled 100% 10 weeds, e.g. Digitaria ciliaris, Echinochloa crus-galli, Setaria viridis, Chenopodium album, Amaranthus retroflexus, Xanthium pennsylvanicum, and Abutilon theophrasti and did not harm crops such as corn, wheat, soy bean, beet, and cotton.

IT **167268-20-4P 167268-21-5P 167268-22-6P**
167268-23-7P 167268-24-8P 167268-25-9P
167268-26-0P 167268-27-1P 167268-28-2P
167268-29-3P 167268-30-6P 167268-31-7P
167268-32-8P 167268-33-9P 167268-34-0P
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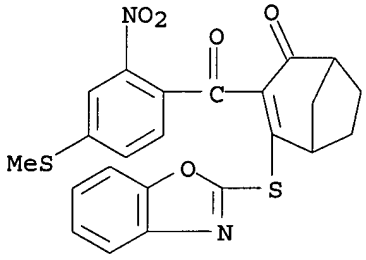
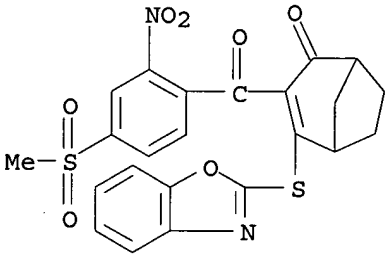
167268-44-2P 167268-45-3P

RL: **ARG (Analytical reagent use)**; BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); ANST (Analytical study); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of (heterocyclylthio)benzoylbicyclo[3.2.1]octenone derivs. and related compds. as herbicides)

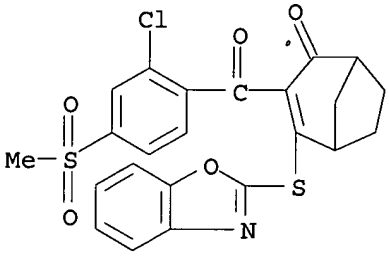
RN 167268-20-4 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(2-benzoxazolylthio)-3-[4-(methylthio)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



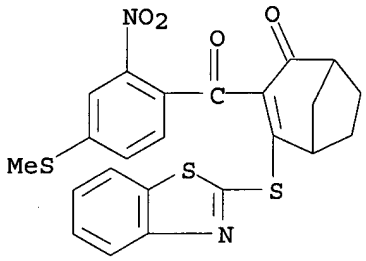
RN 167268-21-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(2-benzoxazolylthio)-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



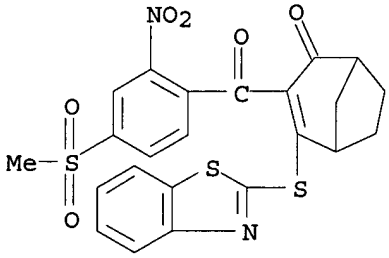
RN 167268-22-6 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(2-benzoxazolylthio)-3-[2-chloro-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



RN 167268-23-7 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(2-benzothiazolylthio)-3-[4-(methylthio)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



RN 167268-24-8 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(2-benzothiazolylthio)-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



RN 167268-25-9 CAPLUS
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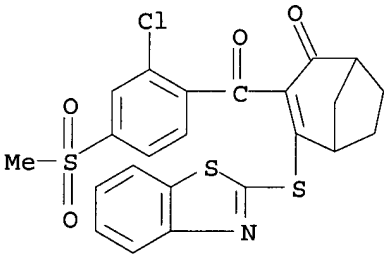
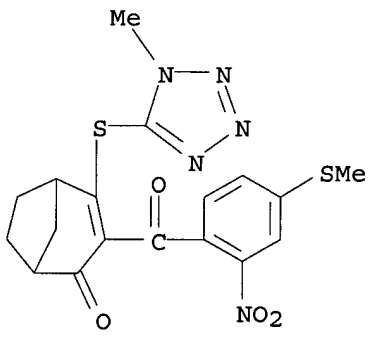
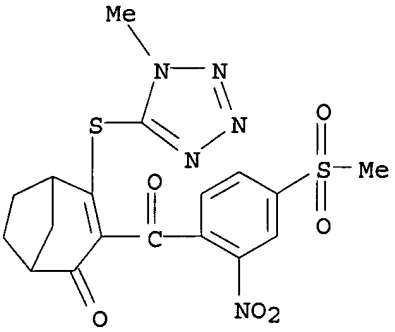


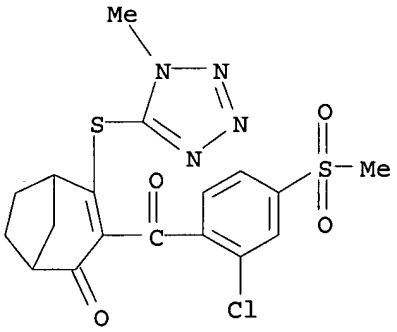
RN 167268-26-0 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-[(1-methyl-1H-tetrazol-5-yl)thio]-3-[4-(methylthio)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



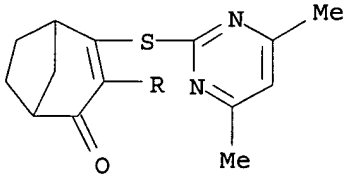
RN 167268-27-1 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[4-(methylsulfonyl)-2-nitrobenzoyl]-4-[(1-methyl-1H-tetrazol-5-yl)thio]- (9CI) (CA INDEX NAME)

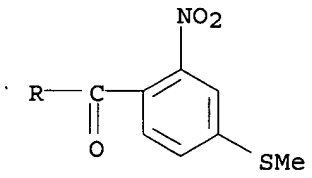


RN 167268-28-2 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(1-methyl-1H-tetrazol-5-yl)thio]- (9CI) (CA INDEX NAME)

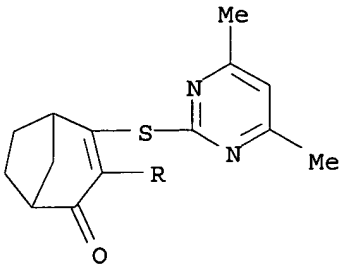


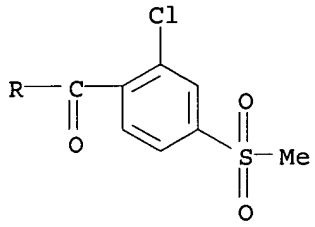
RN 167268-29-3 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-[(4,6-dimethyl-2-pyrimidinyl)thio]-3-[4-(methylthio)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



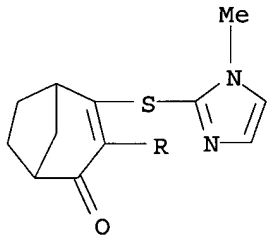


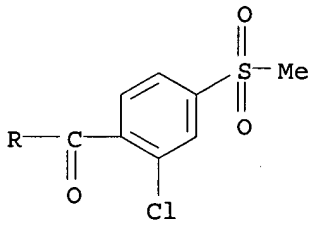
RN 167268-30-6 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(4,6-dimethyl-2-pyrimidinyl)thio]- (9CI) (CA INDEX NAME)



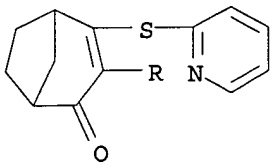


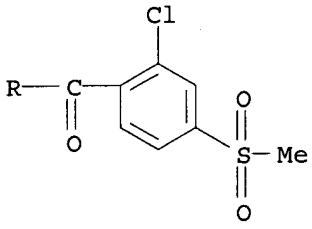
RN 167268-31-7 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(1-methyl-1H-imidazol-2-yl)thio]- (9CI) (CA INDEX NAME)



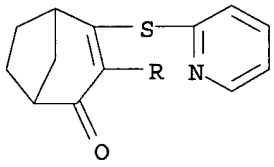


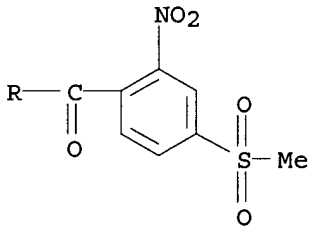
RN 167268-32-8 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(2-pyridinylthio)- (9CI) (CA INDEX NAME)



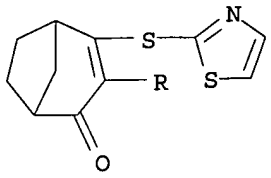


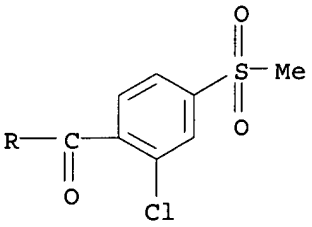
RN 167268-33-9 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[4-(methylsulfonyl)-2-nitrobenzoyl]-4-(2-pyridinylthio)- (9CI) (CA INDEX NAME)



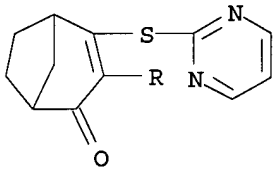


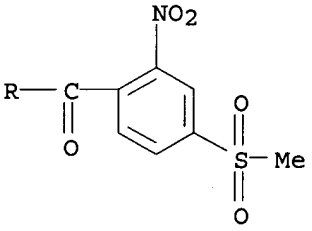
RN 167268-34-0 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(2-thiazolylthio)- (9CI) (CA INDEX NAME)



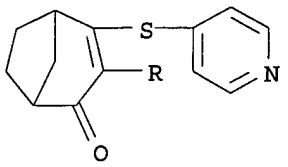


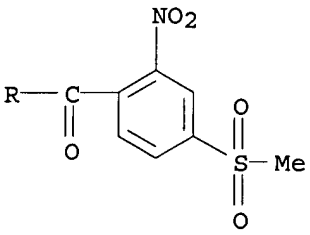
RN 167268-35-1 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[4-(methylsulfonyl)-2-nitrobenzoyl]-4-(2-pyrimidinylthio)- (9CI) (CA INDEX NAME)



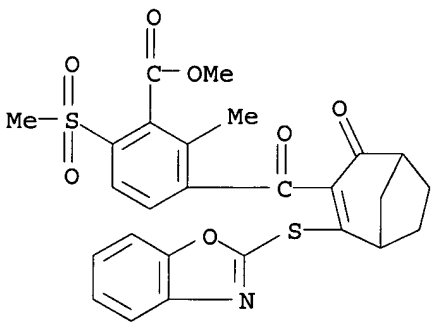


RN 167268-36-2 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[4-(methylsulfonyl)-2-nitrobenzoyl]-4-(4-pyridinylthio)- (9CI) (CA INDEX NAME)

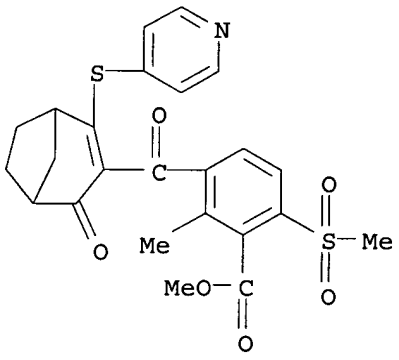




RN 167268-37-3 CAPLUS
CN Benzoic acid, 3-[[2-(2-benzoxazolylthio)-4-oxobicyclo[3.2.1]oct-2-en-3-yl]carbonyl]-2-methyl-6-(methylsulfonyl)-, methyl ester (9CI) (CA INDEX NAME)

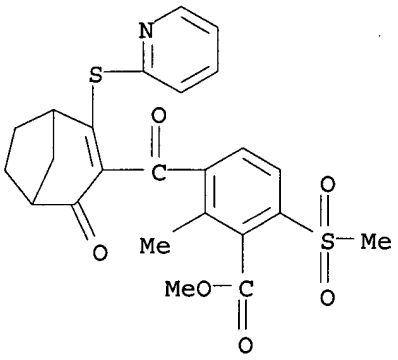


RN 167268-38-4 CAPLUS
CN Benzoic acid, 2-methyl-6-(methylsulfonyl)-3-[[4-oxo-2-(4-pyridinylthio)bicyclo[3.2.1]oct-2-en-3-yl]carbonyl]-, methyl ester (9CI) (CA INDEX NAME)

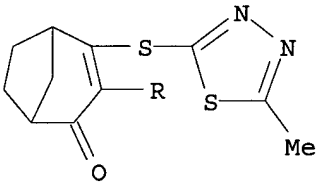


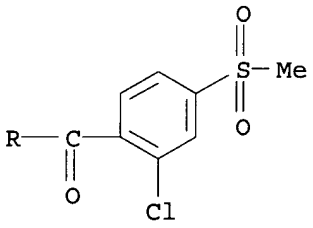
RN 167268-39-5 CAPLUS
CN Benzoic acid, 2-methyl-6-(methylsulfonyl)-3-[[4-oxo-2-(2-

pyridinylthio)bicyclo[3.2.1]oct-2-en-3-yl]carbonyl]-, methyl ester (9CI) (CA INDEX NAME)

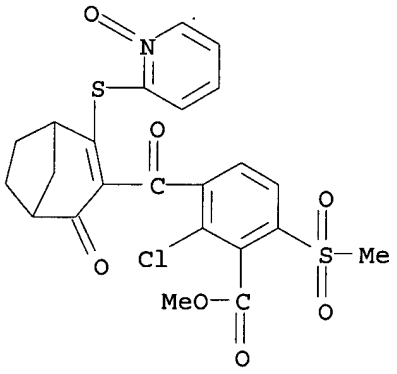


RN 167268-40-8 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(5-methyl-1,3,4-thiadiazol-2-yl)thio]- (9CI) (CA INDEX NAME)

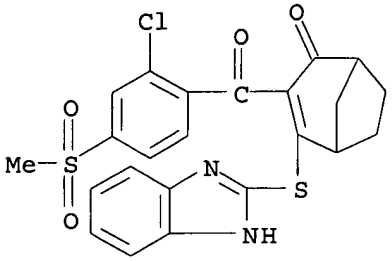




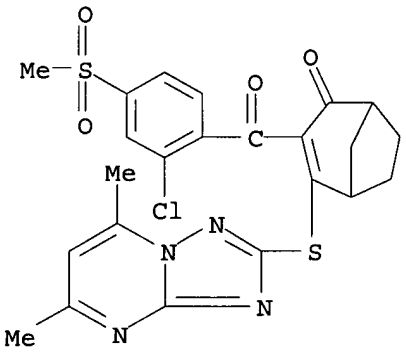
RN 167268-41-9 CAPLUS
CN Benzoic acid, 2-chloro-6-(methylsulfonyl)-3-[[2-[(1-oxido-2-pyridinyl)thio]-4-oxobicyclo[3.2.1]oct-2-en-3-yl]carbonyl]-, methyl ester (9CI) (CA INDEX NAME)



RN 167268-42-0 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(1H-benzimidazol-2-ylthio)-3-[2-chloro-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)

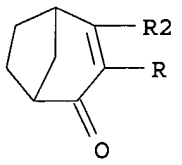


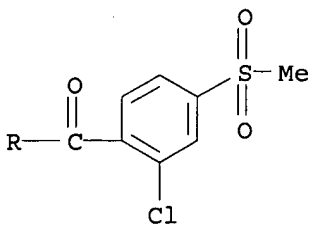
RN 167268-43-1 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(5,7-dimethyl[1,2,4]triazolo[1,5-a]pyrimidin-2-yl)thio]- (9CI) (CA INDEX NAME)

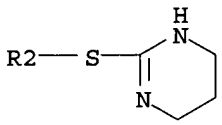


RN 167268-44-2 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-[(1,4,5,6-tetrahydro-2-pyrimidinyl)thio]- (9CI) (CA INDEX NAME)

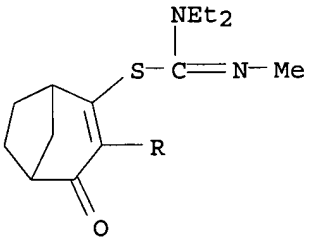
PAGE 1-A

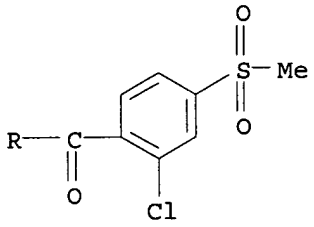






RN 167268-45-3 CAPLUS
CN Carbamimidothioic acid, N,N-diethyl-N'-methyl-, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-oxobicyclo[3.2.1]oct-2-en-2-yl ester (9CI) (CA INDEX NAME)





=> d his

(FILE 'HOME' ENTERED AT 12:04:10 ON 04 MAY 2003)

FILE 'REGISTRY' ENTERED AT 12:04:16 ON 04 MAY 2003
L1 STRUCTURE UPLOADED
L2 26 S L1
L3 2122 S L1 FUL

FILE 'CAPLUS' ENTERED AT 12:04:48 ON 04 MAY 2003
L4 326 S L3
L5 2 S L3/ARG

=> s l4 and (herbicide? or insecticide? or pesticide? or fungicide? or crop? or plant?)
76029 HERBICIDE?
90386 INSECTICIDE?
69436 PESTICIDE?
86510 FUNGICIDE?
77615 CROP?
843350 PLANT?
L6 151 L4 AND (HERBICIDE? OR INSECTICIDE? OR PESTICIDE? OR FUNGICIDE? OR CROP? OR PLANT?)

=> s l6 not l5
L7 149 L6 NOT L5

```
=> d l7 1- ibib abs fhitstry
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The following are valid formats:

ABS --------- GI and AB
ALL --------- BIB, AB, IND, RE
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DMAX -------- MAX, delimited for post-processing
FAM --------- AN, PI and PRAI in table, plus Patent Family data
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MAX --------- ALL, plus Patent FAM, RE
PATS -------- PI, SO
SAM --------- CC, SX, TI, ST, IT
SCAN -------- CC, SX, TI, ST, IT (random display, no answer numbers;
              SCAN must be entered on the same line as the DISPLAY,
              e.g., D SCAN or DISPLAY SCAN)
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IABS -------- ABS, indented with text labels
IALL -------- ALL, indented with text labels
IBIB -------- BIB, indented with text labels
IMAX -------- MAX, indented with text labels
ISTD -------- STD, indented with text labels

OBIB -------- AN, plus Bibliographic Data (original)
OIBIB ------- OBIB, indented with text labels

SBIB -------- BIB, no citations
SIBIB ------- IBIB, no citations

HIT --------- Fields containing hit terms
HITIND ------ IC, ICA, ICI, NCL, CC and index field (ST and IT)
              containing hit terms
HITRN ------- HIT RN and its text modification
HITSTR ------ HIT RN, its text modification, its CA index name, and
              its structure diagram
HITSEQ ------ HIT RN, its text modification, its CA index name, its
              structure diagram, plus NTE and SEQ fields
FHITSTR ----- First HIT RN, its text modification, its CA index name, and
              its structure diagram
FHITSEQ ----- First HIT RN, its text modification, its CA index name, its
              structure diagram, plus NTE and SEQ fields
KWIC -------- Hit term plus 20 words on either side
OCC --------- Number of occurrence of hit term and field in which it occurs

To display a particular field or fields, enter the display field
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FHITSTR, HITSEQ, FHITSEQ, KWIC, and OCC) may be used with DISPLAY ACC
to view a specified Accession Number.
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09/ 943,037

ENTER DISPLAY FORMAT (BIB):ibib abs fhitstr
YOU HAVE REQUESTED DATA FROM 149 ANSWERS - CONTINUE? Y/(N):y

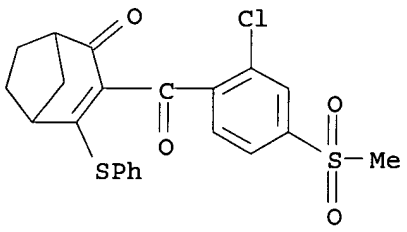
L7 ANSWER 1 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:317415 CAPLUS
TITLE: Synergistic herbicidal compositions
INVENTOR(S): Kotzian, Georg Ruediger
PATENT ASSIGNEE(S): Syngenta Participations AG, Switz.
SOURCE: Ger. Offen., 10 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10246212	A1	20030424	DE 2002-10246212	20021004

PRIORITY APPLN. INFO.: CH 2001-1850 A 20011008

AB The title compns. comprise I (M = alkali or an alk.-earth metal; n = 1 or 2; r, s = 0, 1/2, 1, 1 1/2, 2, 2 1/2 or 3; L = Et acetate, acetonitrile, DMSO, DMF, dimethylacetamide, N-methyl-2-pyrrolidone, acetone, butanone, methylene chloride, chloroform, trichloroethane, THF, di-Et ether, 1,2-dimethoxyethane, dioxane, Me tert.-Bu ether, chlorobenzene, toluene or xylene) and a known **herbicide** selected from molinate, diclosulam, flufenpyr and its ethylester, mesosulfuron and its methylester, benzobicyclon, oxaziclomefone, profoxidim, pyrazogyl and indanofan.

IT INDEXING IN PROGRESS
IT **156963-66-5D**, Benzobicyclon, mixts. contg.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



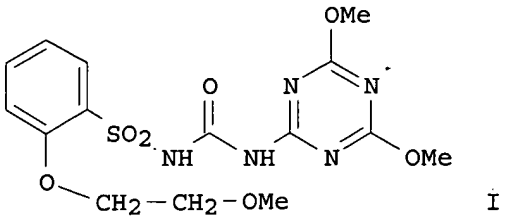
L7 ANSWER 2 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:298729 CAPLUS
TITLE: Synergistic herbicidal mixtures
INVENTOR(S): Kotzian, Georg Ruediger
PATENT ASSIGNEE(S): Syngenta Participations AG, Switz.
SOURCE: Ger. Offen., 8 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10245222	A1	20030417	DE 2002-10245222	20020927

09/ 943,037

PRIORITY APPLN. INFO.: CH 2001-1799 A 20011001

GI



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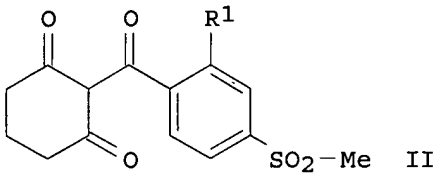


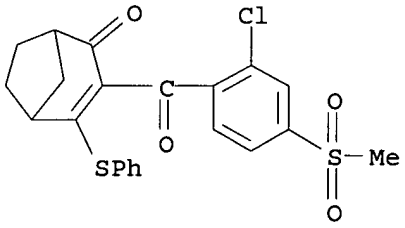
II

AB Synergistic herbicidal mixts. comprise I and II (R1 = Cl or NO2) and or azafenidin, tepraloxydim, pyriminobac Me, bispyribac sodium, benflubutamid, benzfendizone, benzobicyclon, cinidon Et, diclosulam, flufenpyr, flufenpyr Et, mesosulfuron, mesosulfuron Me, penoxsulam, picolinafen, fentrazamide, oxaziclomefone, profoxidim, pyrazogyl, profluazol, propoxycarbazone, propoxycarbazone sodium, amicarbazone, trifloxysulfuron sodium, pyriminobac Me, pyribenzoxim, fentrazamide and tritosulfuron.

IT **156963-66-5D**, Benzobicyclon, mixts. contg.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 3 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:261581 CAPLUS

DOCUMENT NUMBER: 138:267210

TITLE: **Herbicides** containing substituted thien-3-yl-sulfonylamino(thio)carbonyl-triazolin(thi)one

INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Gesing, Ernst Rudolf F.

PATENT ASSIGNEE(S): Bayer Cropscience AG, Germany

SOURCE: PCT Int. Appl., 135 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

09/ 943,037

FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

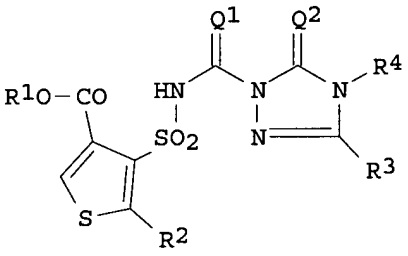
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003026426	A1	20030403	WO 2002-EP10103	20020910

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

DE 10146591	A1	20030410	DE 2001-10146591 20010921

PRIORITY APPLN. INFO.: DE 2001-10146591 A 20010921
GI

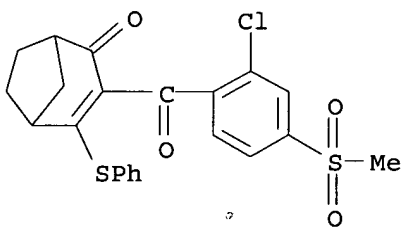


I

AB The invention relates to synergistic herbicidal agents, characterized by an active content of an active ingredient combination comprising (a) one or more compds. of formula (I), in which Q1, Q2, R1, R2, R3 and R4 are defined as per the description, in addn. to salts of the compds. of formula I and (b) at least one of the known **herbicides** listed in the description, in addn. to (c) optionally a safener. The invention also relates to the use of the agents for combating undesired **plant** growth and to a method for producing the inventive agents.

IT **156963-66-5**, Benzobicyclon
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(**herbicides** contg. substituted thien-3-yl-sulfonylamino(thio)carbonyl-triazolin(thi)one)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS

RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 4 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:242099 CAPLUS
DOCUMENT NUMBER: 138:267187
TITLE: Synergistic herbicidal compositions for rice
INVENTOR(S): Kotzian, Georg Ruediger
PATENT ASSIGNEE(S): Syngenta Participations A.-G., Switz.
SOURCE: PCT Int. Appl., 11 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003024224	A2	20030327	WO 2002-EP10542	20020919

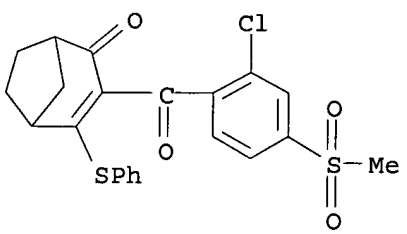
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: CH 2001-1734 A 20010920

AB A synergistic herbicidal compn. for rice comprises as an active ingredient a mixt. of at least two compds. selected from the group of oxadiargyl, oxadiazon, fentrazamide, ethoxysulfuron, quinclorac, pyrazolate, amicarbazone, bromobutide, carfentrazone (-ethyl), pyrazolate, pyraflufen (-ethyl), sulfentrazone, tepraloxydim, clodinafop-propargyl, pretilachlor, butachlor, oxaziclomefone, fentrazamide, benzobicyclon, molinate, quinclorac, bentazone, pyrazolynate, pentoxazone, metamifop, cinosulfuron, imazosulfuron, pyrazosulfuron (-ethyl), azimsulfuron, bensulfuron (-methyl), triasulfuron, prosulfuron, halosulfuron (-methyl), sulfometuron (-methyl), sulfosulfuron, chlorimuron (-ethyl), cyclosulfamuron, tritosulfuron and iodosulfuron.

IT **156963-66-5D**, Benzobicyclon, mixts.
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns. for rice contg.)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 5 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:242096 CAPLUS

09/ 943,037

DOCUMENT NUMBER: 138:267186
TITLE: Herbicidal mixtures based on 3-phenyluracils
INVENTOR(S): Zagar, Cyrill; Sievernich, Bernd; Quakenbush, Laura; Evans, Richard R.; Landes, Max; Newsom, Larry J.; Ortlip, Charles L.; Witschel, Matthias; Landes, Andreas
PATENT ASSIGNEE(S): BASF Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 84 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

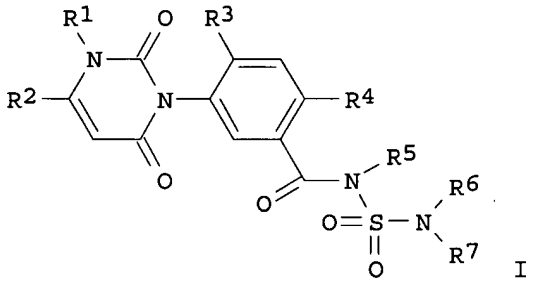
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003024221	A1	20030327	WO 2002-EP10136	20020910

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-318834P P 20010914
US 2001-333135P P 20011127

OTHER SOURCE(S): MARPAT 138:267186
GI



I

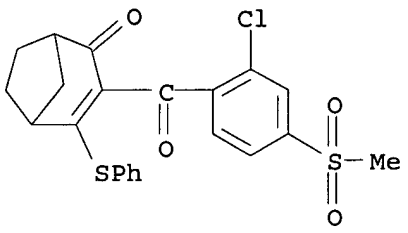
AB Herbidically active compns., comprise: (A) at least one phenyluracil compd. I (R1 = Me, or NH2; R2 = C1-C2-haloalkyl; R3 = H, or halo; R4 = halo, or cyano; R5 = H, cyano, C1-C6-alkyl, C1-C6-alkoxy, C1-C4-alkoxy-C1-C4-alkyl, C3-C7-cycloalkyl, C3-C6-alkenyl, C3-C6-alkynyl, or (un)substituted benzyl; R6, R7 = H, (un)substituted C1-C6-alkyl, C1-C6-alkoxy, C3-C6-alkenyl, C3-C6-alkynyl, C3-C7-cycloalkyl, C3-C7-cycloalkenyl, Ph or benzyl) and/or at least one of its agriculturally acceptable salts; and at least one further active compd., selected from (B) **herbicides** of classes (b1) to (b15): (b1) lipid biosynthesis inhibitors; (b2) acetolactate synthase inhibitors (ALS inhibitors); (b3) photosynthesis inhibitors; (b4) protoporphyrinogen-IX oxidase inhibitors; (b5) bleacher **herbicides**; (b6) enolpyruvyl shikimate 3-phosphate synthase inhibitors (EPSP inhibitors); (b7) glutamine synthetase inhibitors; (b8) 7,8-dihydropteroate synthase

inhibitors (DHP inhibitors); (b9) mitosis inhibitors; (b10) inhibitors of the synthesis of very long chain fatty acids (VLCFA inhibitors); (b11) cellulose biosynthesis inhibitors; (b12) decoupler **herbicides**; (b13) auxin **herbicides**; (b14) auxin transport inhibitors; (b15) other **herbicides**. The **herbicides** in (b15) are selected from the group consisting of benzoylprop, flamprop, flamprop-M, bromobutide, chlorflurenol, cinmethylin, methyldymron, etobenzanid, fosamine, metam, pyributicarb, oxaziclomefone, dazomet, triaziflam and Me bromide. The compns. based on 3-phenyluracils I may also include safeners selected from benoxacor, cloquintocet, cyometrinil, dichlormid, dicyclonon, dietholate, fenchlorazole, fenclorim, flurazole, fluxofenim, furilazole, isoxadifen, mefenpyr, mephenate, naphthalic anhydride, 2,2,5-trimethyl-3-(dichloroacetyl)-1,3-oxazolidine, 4-(dichloroacetyl)-1-oxa-4-azaspiro[4.5]decane and oxabetrinil, and agriculturally acceptable salts of the active compds.

IT **156963-66-5D**, Benzobicyclon, mixts. with 3-phenyluracil derivs.
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(herbicidal compns. contg.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 6 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:221655 CAPLUS
DOCUMENT NUMBER: 138:237899
TITLE: Preparation of (3-aminocarbonylbenzoyl)cyclohexanediones as **herbicides**
INVENTOR(S): Seitz, Thomas; Van Almsick, Andreas; Willms, Lothar; Auler, Thomas; Bieringer, Hermann; Menne, Hubert
PATENT ASSIGNEE(S): Bayer Cropscience Gmbh, Germany
SOURCE: PCT Int. Appl., 59 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

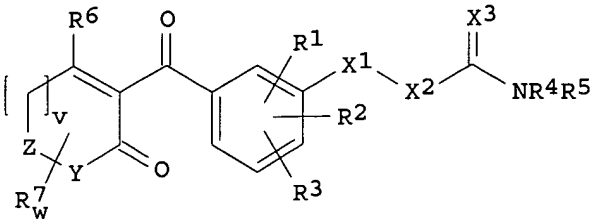
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003022810	A1	20030320	WO 2002-EP9876	20020904

W: AE, AG, AL, AM, AU, AZ, BA, BB, BR, BY, BZ, CA, CN, CO, CR, CU, DM, DZ, EC, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, OM, PH, PL, RO, RU, SG, SI, TJ, TM, TN, TT, UA, US, UZ, VC, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,

Applicant's PCT

NE, SN, TD, TG
DE 10144529 A1 20030327 DE 2001-10144529 20010911
PRIORITY APPLN. INFO.: DE 2001-10144529 A 20010911
OTHER SOURCE(S): MARPAT 138:237899
GI



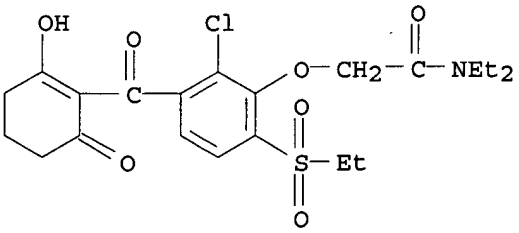
I

AB Title compds. [I; X1 = O, S(O)nNH, NR4; X2 = (substituted) alkylene, alkenylene, alkynylene; X3 = O, S; R1-R3 = H, SH, NO2, halo, cyano, thiocyanato, alkylcarbonyloxy, etc.; R4, R5 = H, (cyclo)alkyl, (cyclo)alkenyl, (cyclo)alkynyl, alkylcycloalkyl, etc.; NR4R5 = 5-6 membered (satd.) (Ph-benzocondensed) (substituted) heterocyclyl; R6 = OR8, (halo)alkylthio, (halo)alkenylthio, (halo)alkynylthio, etc.; R7 = H, tetrahydro(thio)pyran-3-yl, tetrahydropyran-4-yl, alkyl, cycloalkyl, etc.; Y = O, S, NH, N-alkyl, CHR7, CR72; Z = O, S, SO, SO2, NH, N-alkyl, CHR9, CR92; R8 = H, (halo)alkyl, alkoxyalkyl, CHO, etc.; R9 = H, halo, cyano, NO2, (halo)alkyl, etc.; n = 0-2; v = 0-3; w = 0-4], were prepd. Thus, 2-chloro-3-(N,N-diethylaminocarbonylmethoxy)-4-ethylsulfonylbenzoic acid 3-oxo-1-cyclohexenyl ester (prepn. given) in MeCN was dropwise treated with Me2C(OH)CN and Et3N followed by stirring for 2 h at room temp. and stirring with KCN for 10 h at room temp. to give 40% 2-[2-chloro-3-(N,N-diethylaminocarbonylmethoxy)-4-ethylsulfonylbenzoyl]cyclohexane-1,3-dione. I (R1 = 2-Cl; R2 = 4-Cl; R3 = H; Y, Z = CH2; v = 1; X3 = O; R6 = OH; X1X2 = OCH2; NR4R5 = NEt2) at 90 g a.i./ha showed 90-95% postemergent control of Cyperus serotinus, Monochoria vaginalis, Sagittaria pygmaea and 0% damage of Oryza sativa.

IT **502149-19-1P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of (aminocarbonylbenzoyl)cyclohexanediones as **herbicides**)

RN 502149-19-1 CAPLUS

CN Acetamide, 2-[2-chloro-6-(ethylsulfonyl)-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]phenoxy]-N,N-diethyl- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

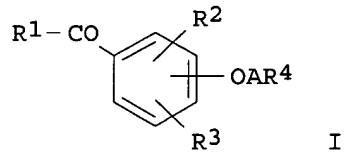
L7 ANSWER 7 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:202383 CAPLUS

09/ 943,037

DOCUMENT NUMBER: 138:233416
TITLE: Synergistic herbicidal mixtures comprising phenyl ketones
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Hoischen, Dorothee; Mueller, Klaus-Helmut; Schwarz, Hans-Georg; Herrmann, Stefan; Kather, Kristian; Schallner, Otto; Goto, Toshio; Shirakura, Shinichi
PATENT ASSIGNEE(S): Bayer Cropscience A.-G., Germany
SOURCE: PCT Int. Appl., 225 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003020033	A1	20030313	WO 2002-EP9243	20020819
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10142333	A1	20030320	DE 2001-10142333	20010830

PRIORITY APPLN. INFO.: DE 2001-10142333 A 20010830
OTHER SOURCE(S): MARPAT 138:233416
GI



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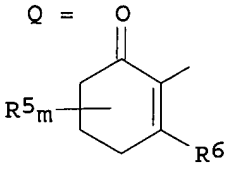
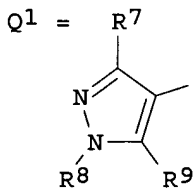




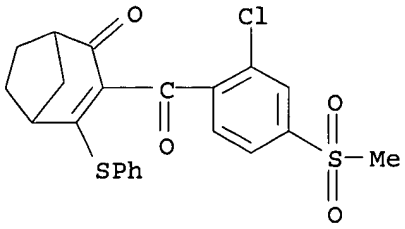
AB The title mixts. comprise an Ph ketone I [A = alkylene; R1 Q, Q1, etc.; R2, R3 = H, NO2, CN, CO2H, (un)substituted alkyl, alkoxy, alkylthio, etc.; R4 = (un)substituted heterocyclyl; R5 = halo, (un)substituted alkyl, alkoxycarbonyl, etc.; R6 = OH, formyloxy, halo, (un)substituted alkoxy, alkylthio, alkylsulfinyl, slkylsulfonyl, etc.; R7 = H, CN, (un)substituted alkoxy, alkylthio, alkylsulfinyl, slkylsulfonyl, etc; R8 = H, (un)substituted alkyl, alkenyl, alkynyl, etc.; R9= OH, formyloxy, (un)substituted alkoxy, alkylcarbonyloxy, etc.; m = 0, 1-6] and any of a

very large no. of conventional **herbicides**, and, optionally, a known safener.

IT **156963-66-5D**, (Benzobicyclon), mixts. with Ph ketones
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)

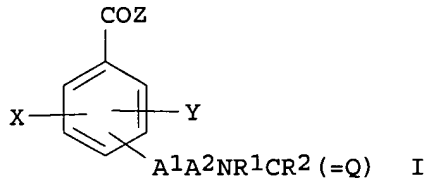


REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

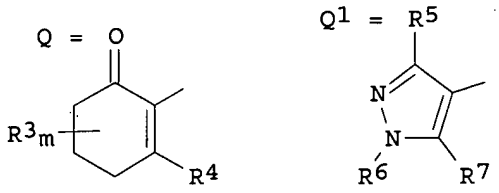
L7 ANSWER 8 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:173349 CAPLUS
DOCUMENT NUMBER: 138:200324
TITLE: Synergistic herbicidal compositions comprising aryl ketones
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Hoischen, Dorothee; Mueller, Klaus-Helmut; Schwarz, Hans-Georg; Herrmann, Stefan; Kather, Kristian; Schallner, Otto; Goto, Toshio; Shirakura, Shinichi
PATENT ASSIGNEE(S): Bayer Cropscience AG, Germany; et al.
SOURCE: PCT Int. Appl., 180 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003017766	A2	20030306	WO 2002-EP9236	20020819
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10142334	A1	20030320	DE 2001-10142334	20010830

PRIORITY APPLN. INFO.: DE 2001-10142334 A 20010830
OTHER SOURCE(S): MARPAT 138:200324
GI



I

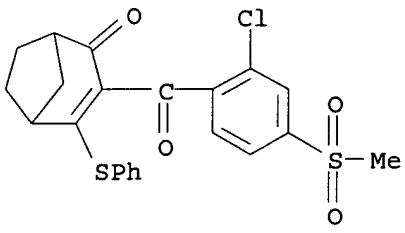


AB Synergistic herbicidal compns. comprise aryl ketones I [A1 = bond or O; A2 = alkylene, alkenediyl or alkynediyl; Q = O or S; R1 = H, (un)substituted alkyl, alkylthio, alkylsulfinyl, alkylsulfonyl, etc.; R2 = H, amino, cyanamino, nitroamino, etc.; X, Y = H, nitro, cyano, carboxy, carbamoyl, thiocarbamoyl, halo, (un)substituted alkyl, alkoxy, alkylthio, alkylsulfinyl, alkylsulfonyl etc.; Z = Q, Q1, etc.; m = 0, 1-6; R3 = H, halo, (un)substituted alkyl, alkylthio, etc.; R4 = OH, formyloxy, halo, (un)substituted alkoxy, alkylthio, etc.; R5 = H, cyano, carbamoyl, thiocarbamoyl, halo, (un)substituted alkyl, alkoxy, etc.; R6 = H, (un)substituted alkyl, alkenyl, alkynyk, cycloalkyl, etc.; R7 = OH, formyloxy (un)substituted alkoxy, alkylcarbonyloxy, alkoxycarbonyloxy, etc.] and any of a very large no. of known **herbicides**. Optionally the compns. include safening agents.

IT **156963-66-5D**, Benzobicyclon, mixts. with aryl ketones
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 9 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:133229 CAPLUS

DOCUMENT NUMBER: 138:187515

TITLE: Preparation of 2-(3-sulfonylbenzoyl)cyclohexanones as **herbicides**

INVENTOR(S): Von Deyn, Wolfgang; Baumann, Ernst; Hofmann, Michael; Kordes, Markus; Misslitz, Ulf; Parra Rapado, Liliana; Zagar, Cyrill; Witschel, Matthias; Landes, Andreas

PATENT ASSIGNEE(S): BASF Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 65 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

09/ 943,037

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003014071	A1	20030220	WO 2002-EP8320	20020726

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: DE 2001-10137049 A 20010808

OTHER SOURCE(S): MARPAT 138:187515

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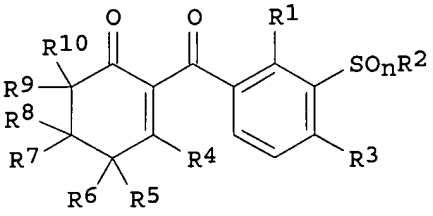


I

AB Title compds. [I; R1 = (halo)alkyl, alkoxyalkyl; R2 = (halo)alkyl; R3 = halo, cyano, NO2, (halo)alkyl, (halo)alkoxy, (halo)alkylthio, etc.; R4 = OH, SR11, NR12R13; R5, R6, R9, R10 = H, alkyl; R7, R8 = H, alkyl; or CR7R8 = carbonyl group; n = 0-2; R11 = (substituted) alkyl, Ph; R12 = H, alkyl, alkoxy; R13 = H, alkyl; or NR12R13 = 5-6 membered (satd.) (substituted) heterocyclyl], were prepd. Thus, cyclohexane-1,3-dione was treated with Et3N followed by dropwise treatment with 2-methyl-3,4-di(methylsulfonyl)benzoyl chloride (prepn. given) in MeCN at 0.degree.-10.degree.. The reaction mixt. was stirred for 1 h at 0.degree.-10.degree. followed by stirring with Me3SiCN for 12 h at room temp. to give 86% 2-[2-methyl-3,4-di(methylsulfonyl)benzoyl]cyclohexane-1,3-dione. Several I at 0.125 or 0.0625 kg/ha were said to show very good postemergent herbicidal activity.

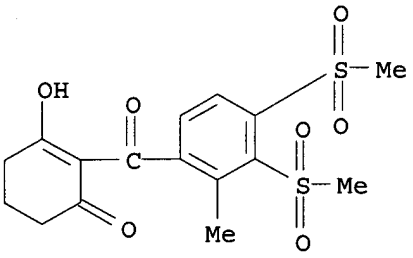
IT **497227-20-0P**

RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)

(prepn. of (sulfonylbenzoyl)cyclohexanones as **herbicides**)

RN 497227-20-0 CAPLUS

CN 2-Cyclohexen-1-one, 3-hydroxy-2-[2-methyl-3,4-bis(methylsulfonyl)benzoyl]-(9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

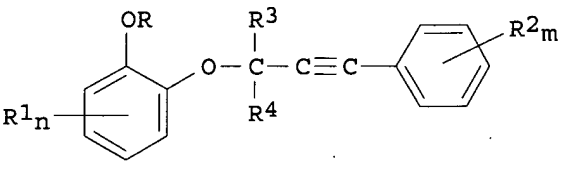
L7 ANSWER 10 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:97245 CAPLUS
DOCUMENT NUMBER: 138:149044
TITLE: Synergistic herbicidal compositions
INVENTOR(S): Schaetzer, Juergen; Wenger, Jean; Hall, Roger Graham; Nebel, Kurt; Hole, Stephen
PATENT ASSIGNEE(S): Syngenta Participations A.-G., Switz.
SOURCE: PCT Int. Appl., 47 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003009686	A1	20030206	WO 2002-EP8203	20020723

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: CH 2001-1377 A 20010724
OTHER SOURCE(S): MARPAT 138:149044
GI

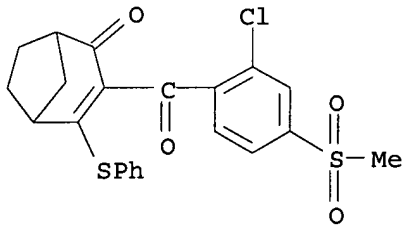


I

AB The title compn. comprises I (R H, COR5, etc.; R1 = halo, CN, SCN,, SF5, NO2, etc.; R2 = halo, CN, SCN, SF5, NO2, etc.; R3, R4 = H, halo, CN, alkyl or alkoxy; R3R4 = alkylene; R5 = H, alkyl, haloalkyl or cycloalkyl; n = 0, 1-4; m = 0, 1-5; n+m .gtoreq.1) or an I salt, and a synergistically effective amt. of one or more known coherbicides. The compns. may addnl. comprise a safener.

09/ 943,037

IT **156963-66-5D**, Benzobicyclon, mixts. contg.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



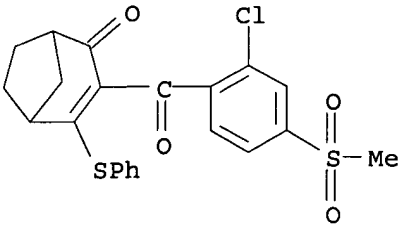
REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 11 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:5684 CAPLUS
DOCUMENT NUMBER: 138:68331
TITLE: Synergistic selective herbicidal compositions based on pyrimidine derivatives
INVENTOR(S): Feucht, Dieter; Kremer, Mathias; Fuersch, Helmut; Wellmann, Arndt; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 90 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003000058	A1	20030103	WO 2002-EP6314	20020610
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10129856	A1	20030102	DE 2001-10129856	20010621

PRIORITY APPLN. INFO.: DE 2001-10129856 A 20010621
OTHER SOURCE(S): MARPAT 138:68331
AB The invention relates to synergistic, selective **herbicide** combinations consisting of known phenoxypyrimidine derivs., propoxycarbazone sodium or flucarbazone sodium, and any of a very large no. of known **herbicides**, and, optionally, addnl. safeners.
IT **156963-66-5D**, Benzobicyclon), mixts. contg. phenoxypyrimidine derivs. and
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic selective herbicidal compns.)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-

(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

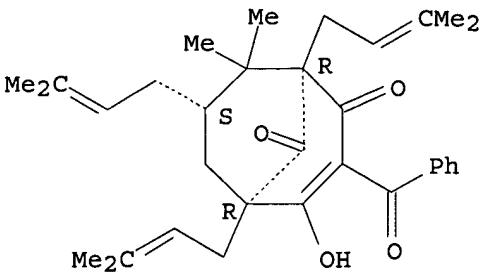
L7 ANSWER 12 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:144 CAPLUS
DOCUMENT NUMBER: 138:183970
TITLE: Polyprenylated benzophenones from Garcinia assigu and their potential cancer chemopreventive activities
AUTHOR(S): Ito, Chihiro; Itoigawa, Masataka; Miyamoto, Yoshiaki; Onoda, Saori; Rao, K. Sundar; Mukainaka, Teruo; Tokuda, Harukuni; Nishino, Hoyoku; Furukawa, Hiroshi
CORPORATE SOURCE: Faculty of Pharmacy, Meijo University, Tempaku, Nagoya, 468-8503, Japan
SOURCE: Journal of Natural Products (2003), 66(2), 206-209
CODEN: JNPRDF; ISSN: 0163-3864
PUBLISHER: American Chemical Society
DOCUMENT TYPE: Journal
LANGUAGE: English

AB In a further study on the chem. constituents of Garcinia assigu, two new benzophenones corresponding to the 13-O-Me ethers (1 and 2) of the known isogarcinol and garcinol, resp., were isolated and characterized, along with known benzophenones (3-6). Inhibitory effects of the benzophenones isolated from this **plant** on Epstein-Barr virus early antigen (EBV-EA) activation induced by 12-O-tetradecanoylphorbol-13-acetate in Raji cells and their radical-scavenging ability against 1,1-diphenyl-2-picrylhydrazyl were demonstrated. The cyclized polyprenylbenzophenones (1-5) showed comparable or stronger potential cancer chemopreventive activity when compared to glycyrrhetic acid, a known anti-tumor promoter.

IT **59111-58-9**, Clusianone
RL: BSU (Biological study, unclassified); PAC (Pharmacological activity); BIOL (Biological study)
(polyprenylated benzophenones from Garcinia assigu and their potential cancer chemopreventive activities)

RN 59111-58-9 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-benzoyl-4-hydroxy-8,8-dimethyl-1,5,7-tris(3-methyl-2-butenyl)-, (1R,5R,7S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.



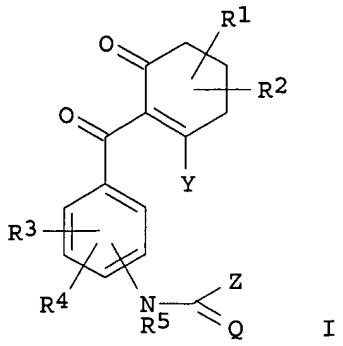
REFERENCE COUNT: 15 THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 13 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:888717 CAPLUS
DOCUMENT NUMBER: 137:370089
TITLE: Preparation of benzoylcyclohexenones as **herbicides**
INVENTOR(S): Schwarz, Hans-Georg; Mueller, Klaus-Helmut; Hermann, Stefan; Hoischen, Dorothee; Kather, Kristian; Lehr, Stefan; Schallner, Otto; Drewes, Mark Wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 141 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002092574	A1	20021121	WO 2002-EP4851	20020503
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10138576	A1	20021121	DE 2001-10138576	20010806

PRIORITY APPLN. INFO.: DE 2001-10123887 A 20010516
DE 2001-10138576 A 20010806

OTHER SOURCE(S): MARPAT 137:370089
GI



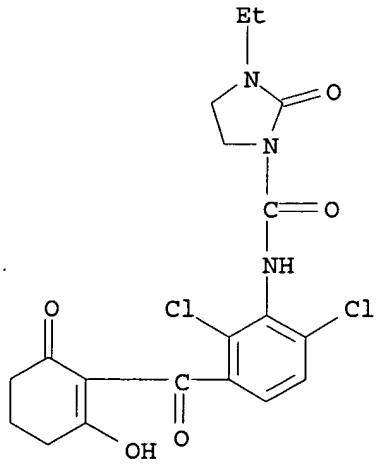
I

AB Title compds. [I; Q = O, S; R1 = H, halo, (substituted) alkyl, alkylthio, aryl; R2 = H, halo, (substituted) alkyl; or R1R2 = O, alkylene; R3, R4 = H, NO2, cyano, CO2H, (thio)carbamoyl, halo, (substituted) alkyl, alkoxy, etc.; R5 = H, (substituted) alkyl, alkoxy, alkylthio, etc.; Y = OH, halo, (substituted) alkoxy, alkylthio, alkylsulfinyl, etc.; Z = H, amino, cyanoamino, nitroamino, hydroxyamino, hydrazino, (substituted) alkyl, alkylcarbonyl, alkoxy, alkoxycarbonyl, etc.], were prepd. Thus, a mixt. of 2,4-dichloro-3-[(3-methyl-2-oxo-1-imidazolidinyl)carbonylamino]benzoic acid (prepn. given), cyclohexane-1,3-dione, dicyclohexylcarbodiimide (DCC), and MeCN was stirred for 18 at 20.degree. followed by filtering to give 49% N-[2,6-dichloro-3-(2,6-dioxocyclohexyl)carbonylphenyl]-3-methyl-2-oxo-1-imidazolidinecarboxamide. Several I were said to show strong pre- and postemergent herbicidal activity and good **crop** tolerance.

IT **475555-75-0P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoylcyclohexenones as **herbicides**)

RN 475555-75-0 CAPLUS

CN 1-Imidazolidinecarboxamide, N-[2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]phenyl]-3-ethyl-2-oxo- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 14 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:868914 CAPLUS

09/ 943,037

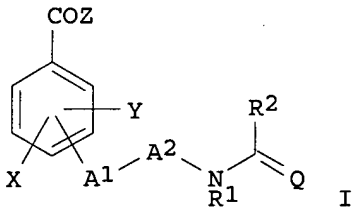
DOCUMENT NUMBER: 137:353017
TITLE: Preparation of 4-benzoylpyrazoles and 2-benzoyl-1,3-cyclohexanediones as **herbicides**
INVENTOR(S): Herrmann, Stefan; Hoischen, Dorothee; Kather, Kristian; Mueller, Klaus-Helmut; Schallner, Otto; Schwarz, Hans-Georg; Drewes, Mark Wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 136 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002090336	A1	20021114	WO 2002-EP4701	20020429
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10136449	A1	20021114	DE 2001-10136449	20010726

PRIORITY APPLN. INFO.: DE 2001-10122445 A 20010509
DE 2001-10136449 A 20010726

late

OTHER SOURCE(S): MARPAT 137:353017
GI



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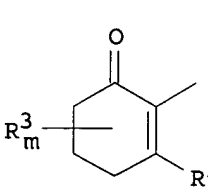

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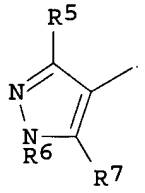
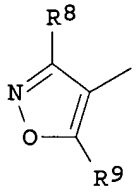


Q2



Q3

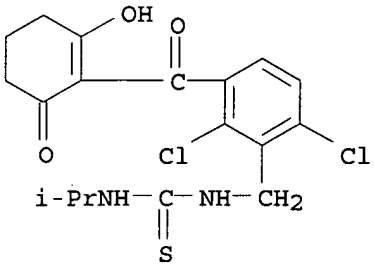
AB Title compds. [I; A1 = bond, O, S, SO, SO2; A2 = alkylene, alkenylene, alkynylene; Q = O, S; R1 = H, (substituted) alkyl, alkoxy, alkylthio, alkylsulfinyl, alkylsulfonyl, etc.; R2 = H, amino, cyanoamino, nitroamino, hydroxyamino, hydrazino, (substituted) alkyl, alkylcarbonyl, alkoxy, alkoxycarbonyl, alkylthio, alkylamino, etc.; X, Y = H, NO2, cyano, CO2H, (thio)carbamoyl, halo, (substituted) alkyl, alkoxy, etc.; Z = Q1, Q2, Q3, CHR11COR10; m = 0-6; R3 = H, halo, (substituted) alkyl, alkylthio, etc.;

R4 = OH, formyloxy, halo, (substituted) alkoxy, alkylthio, alkylsulfonyl, etc.; R5 = H, cyano, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, etc.; R6 = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkyl, etc.; R7 = OH, formyloxy, (substituted) alkoxy, alkylcarbonyl, etc.; R8 = H, cyano, (thio)carbamoyl, halo, (substituted) alkyl, alkylcarbonyl, alkoxy, etc.; R9, R10 = H, (substituted) (cyclo)alkyl; R11 = H, cyano, carbamoyl, halo, (substituted) alkyl, alkoxy, alkoxycarbonyl, etc.], were prepd. Thus, 4-[3-(2-aminoethoxy)-2,4-dichlorobenzoyl]-1-ethyl-5-hydroxy-1H-pyrazole (prepn. given) in MeOH was treated with MeCNCO followed by reflux for 24 h to give 91% N-[2-(2,6-dichloro-3-[(1-ethyl-5-hydroxy-1H-pyrazol-4-yl)carbonyl]phenoxy)ethyl]-N'-methylthiourea. I were said to show strong pre- and postemergent herbicidal activity and good tolerance to e.g. corn and wheat.

IT **474807-31-3P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoylpyrazoles and benzoylcyclohexanediones as **herbicides**)

RN 474807-31-3 CAPLUS

CN Thiourea, N-[[2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]phenyl]methyl]-N'-(1-methylethyl)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 15 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:866616 CAPLUS

DOCUMENT NUMBER: 137:353015

TITLE: Preparation of 4-benzoylpyrazoles and 2-benzoyl-1,3-cyclohexanediones as **herbicides**

INVENTOR(S): Hermann, Stefan; Hoischen, Dorothee; Kather, Kristian; Mueller, Klaus-Helmut; Schallner, Otto; Schwarz, Hans-Georg; Drewes, Mark-wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf

PATENT ASSIGNEE(S): Bayer AG, Germany

SOURCE: Ger. Offen., 52 pp.
CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 2

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10136449	A1	20021114	DE 2001-10136449	20010726
WO 2002090336	A1	20021114	WO 2002-EP4701	20020429

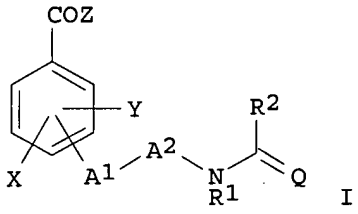
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,

LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

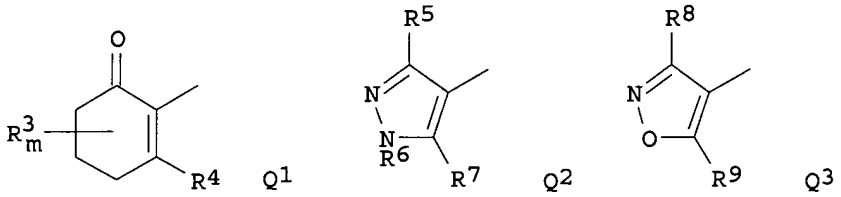
PRIORITY APPLN. INFO.: DE 2001-10122445 IA 20010509
DE 2001-10136449 A 20010726

OTHER SOURCE(S): MARPAT 137:353015

GI



I

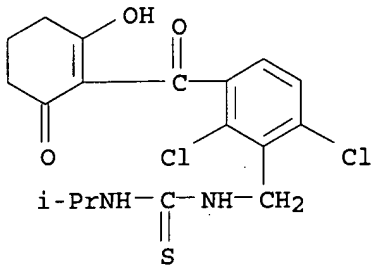


AB Title compds. [I; A1 = bond, O; A2 = alkylene, alkenylene, alkynylene; Q = O, S; R1 = H, (substituted) alkyl, alkoxy, alkylthio, alkylsulfinyl, alkylsulfonyl, etc.; R2 = H, amino, cyanoamino, nitroamino, hydroxyamino, hydrazino, (substituted) alkyl, alkylcarbonyl, alkoxy, alkoxycarbonyl, alkylthio, alkylamino, etc.; X, Y = H, NO2, cyano, CO2H, (thio)carbamoyl, halo, (substituted) alkyl, alkoxy, etc.; Z = Q1, Q2, Q3, CHR11COR10; m = 0-6; R3 = H, halo, (substituted) alkyl, alkylthio, etc.; R4 = OH, formyloxy, halo, (substituted) alkoxy, alkylthio, alkylsulfonyl, etc.; R5 = H, cyano, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, etc.; R6 = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkyl, etc.; R7 = OH, formyloxy, (substituted) alkoxy, alkylcarbonyl, etc.; R8 = H, cyano, (thio)carbamoyl, halo, (substituted) alkyl, alkylcarbonyl, alkoxy, etc.; R9, R10 = H, (substituted) (cyclo)alkyl; R11 = H, cyano, carbamoyl, halo, (substituted) alkyl, alkoxy, alkoxycarbonyl, etc.], were prepd. Thus, 4-[3-(2-aminoethoxy)-2,4-dichlorobenzoyl]-1-ethyl-5-hydroxy-1H-pyrazole (prepn. given) in MeOH was treated with MeCNCO followed by reflux for 24 h to give 91% N-[2-(2,6-dichloro-3-[(1-ethyl-5-hydroxy-1H-pyrazol-4-yl)carbonyl]phenoxy)ethyl]-N'-methylthiourea. I were said to show strong pre- and postemergent herbicidal activity and good tolerance to e.g. corn and wheat.

IT **474807-31-3P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoylpyrazoles and benzoylcyclohexanediones as **herbicides**)

RN 474807-31-3 CAPLUS

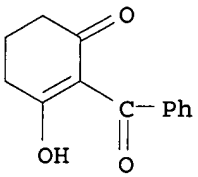
CN Thiourea, N-[[2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]phenyl]methyl]-N'-(1-methylethyl)- (9CI) (CA INDEX NAME)



L7 ANSWER 16 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:855131 CAPLUS
DOCUMENT NUMBER: 138:68303
TITLE: QSAR study of the benzoylcyclohexanediones
AUTHOR(S): Huang, Mei-lan; Ning, Bao-zhu; Su, Ling; Shang, Zhi-cai
CORPORATE SOURCE: Dep. Chem., Zhejiang Univ., Hangzhou, 310027, Peop. Rep. China
SOURCE: Jisuanji Yu Yingyong Huaxue (2002), 19(4), 519-520
CODEN: JYYHE6; ISSN: 1001-4160
PUBLISHER: Jisuanji Yu Yingyong Huaxue Bianjibu
DOCUMENT TYPE: Journal
LANGUAGE: Chinese

AB Classical Hansch QSAR and BP neural networks were used to study the herbicidal activity of benzoylcyclohexanediones. It was suggested that the compds. complex with the receptor through electrostatic interaction. Electron-withdrawing 2-substituents and electron-donating 3-substituents of the Ph ring are favorable for increased herbicidal activity.

IT **61834-43-3D**, derivs.
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(QSAR and neural network study of herbicidal activity of benzoylcyclohexanediones)
RN 61834-43-3 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 17 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:832539 CAPLUS
DOCUMENT NUMBER: 137:321565
TITLE: Synergistic herbicidal composition for rice comprising benzoylcyclohexanedione derivatives
INVENTOR(S): Auler, Thomas; Van Almsick, Andreas; Hacker, Erwin; Millet, Jean-Claude; Endo, Keiji
PATENT ASSIGNEE(S): Bayer Cropscience G.m.b.H., Germany
SOURCE: PCT Int. Appl., 30 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German

09/ 943,037

FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

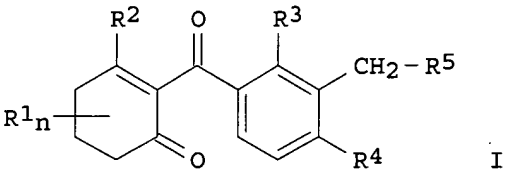
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002085118	A2	20021031	WO 2002-EP4131	20020413
WO 2002085118	A3	20030220		

W: AE, AG, AL, AM, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CN, CO, CR, CU, CZ, DM, DZ, EC, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, OM, PH, PL, RO, RU, SG, SI, SK, TJ, TM, TN, TT, UA, US, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

DE 10119727	A1	20021031	DE 2001-10119727	20010421

PRIORITY APPLN. INFO.: DE 2001-10119727 A 20010421
OTHER SOURCE(S): MARPAT 137:321565
GI



I

AB A synergistic herbicidal compn. comprises a benzoylcyclohexanedione deriv. I (R1 = alkyl; R2 = OH, halo, cyanato, cyano, thiocyano, etc.; R3, R4 = H, halo, alkyl, haloalkyl, etc.; R5 = cycloalkoxy, cycloalkylalkoxy, tetrahydrofuranmethoxy, etc.; n = 0, 1-6) and a **herbicide** effective in rice against monocotyl and/or dicotyl weeds.

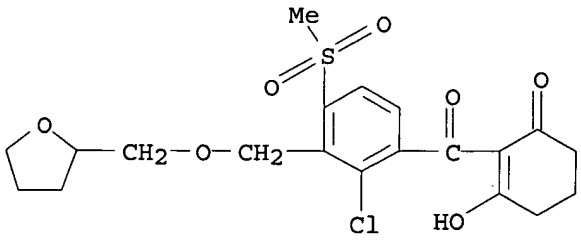
IT **473545-77-6**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compn. for rice)

RN 473545-77-6 CAPLUS

CN Benzoic acid, 2-[[[[[(4,6-dimethoxy-2-pyrimidinyl)amino]carbonyl]amino]sulfonyl]methyl]-, mixt. with 2-[2-chloro-4-(methylsulfonyl)-3-[[(tetrahydro-2-furanyl)methoxy]methyl]benzoyl]-3-hydroxy-2-cyclohexen-1-one (9CI) (CA INDEX NAME)

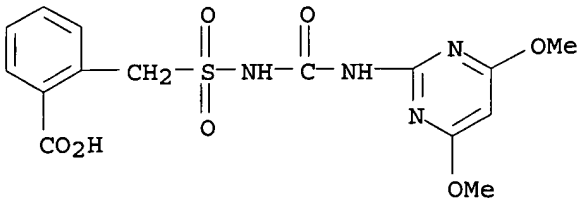
CM 1

CRN 473545-76-5
CMF C20 H23 Cl O7 S



CM 2

CRN 99283-01-9
CMF C15 H16 N4 O7 S

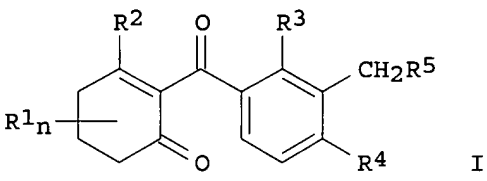


L7 ANSWER 18 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:829926 CAPLUS
DOCUMENT NUMBER: 137:290320
TITLE: Synergistic herbicidal mixtures for rice, comprising benzoylcyclohexanedione derivatives
INVENTOR(S): Auler, Thomas; Van Almsick, Andreas; Hacker, Erwin; Millet, Jean-Claude; Endo, Keiji
PATENT ASSIGNEE(S): Bayer Cropscience GmbH, Germany
SOURCE: Ger. Offen., 10 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10119728	A1	20021031	DE 2001-10119728	20010421
WO 2002089582	A1	20021114	WO 2002-EP4130	20020413

W: AE, AG, AL, AM, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CN, CO, CR, CU, CZ, DM, DZ, EC, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, OM, PH, PL, RO, RU, SG, SI, SK, TJ, TM, TN, TT, UA, US, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: DE 2001-10119728 A 20010421
OTHER SOURCE(S): MARPAT 137:290320
GI

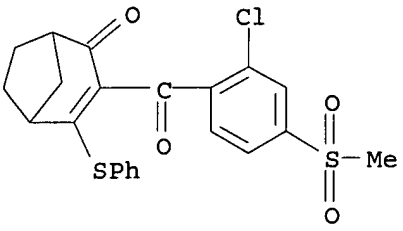


I

AB Synergistic herbicidal mixts. for rice comprise a benzoylcyclohexanedione deriv. I (R1 = alkyl; R2 = OH, halo, cyanato, cyano, thiocyanato, etc.; R3, R4 = H, halo, alkyl, haloalkyl, etc.; R5 = cycloalkoxy, cycloalkylalkoxy, tetrahydrofuranylmethoxy, etc.; n = 0, 1-6) in combination with a **herbicide** selectively effective in rice against monocotyl and/or dicotyl weeds.

IT **156963-66-5D**, Benzobicyclon, mixt. with benzoylcyclohexanedione

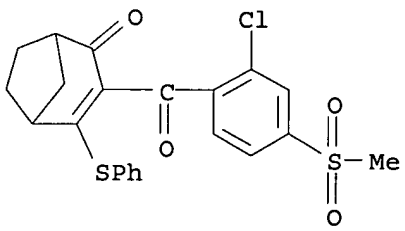
deriv.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic **herbicide** for rice,)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 19 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:802380 CAPLUS
DOCUMENT NUMBER: 137:290316
TITLE: **Herbicide** composition containing thenyl-chlor and benzobicyclon for rice paddy
INVENTOR(S): Takenaka, Junji; Nozaki, Tomohito; Kobutani, Tadashi
PATENT ASSIGNEE(S): Tokuyama Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002308710	A2	20021023	JP 2001-108250	20010406

PRIORITY APPLN. INFO.: JP 2001-108250 20010406
AB A mixt. of thenyl-chlor and benzobicyclon is an effective **herbicide** for controlling a wide spectrum of weeds in flooded rice paddies.
IT **156963-66-5**, Benzobicyclon
RL: AGR (Agricultural use); BCP (Biochemical process); BIOL (Biological study); PROC (Process); USES (Uses)
(**herbicide** compn. contg. thenylchlor and benzobicyclon for rice paddy)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



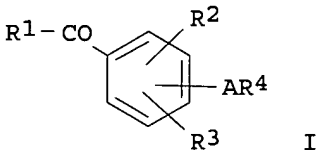
L7 ANSWER 20 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:715989 CAPLUS

09/ 943,037

DOCUMENT NUMBER: 137:212317
TITLE: Synergistic herbicidal compositions containing substituted arylketones
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Mueller, Klaus-Helmut; Lehr, Stefan; Schwarz, Hans-Georg; Goto, Toshio; Shirakura, Shinichi
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany; Nihon Bayer Agrochem K.K.
SOURCE: PCT Int. Appl., 121 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002071845	A1	20020919	WO 2002-EP2207	20020301
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10112104	A1	20020926	DE 2001-10112104	20010314

PRIORITY APPLN. INFO.: DE 2001-10112104 A 20010314
OTHER SOURCE(S): MARPAT 137:212317
GI

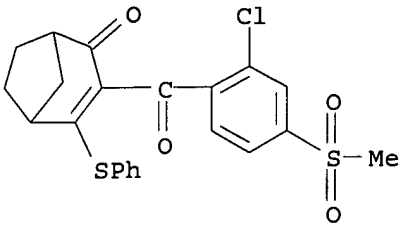


I

AB Synergistic herbicidal compns. contain substituted arylketones I [A = bond or alkanediyl; R1 = substituted pyrazolyl, 1,2-oxazolyl, etc.; R2, R3 = H, NO2, CN, CO2H, halo, alkoxy, alkylthio, etc.; R4 = heterocyclyl] and any of a very large no. of known **herbicides**.

IT **156963-66-5D**, Benzobicyclon, mixts. with arylketones
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 21 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:649972 CAPLUS
DOCUMENT NUMBER: 137:181103
TITLE: **Herbicides** containing condensed cyclic benzoyl derivatives
INVENTOR(S): Okawa, Shinichiro; Saito, Masatoshi
PATENT ASSIGNEE(S): Idemitsu Kosan Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 52 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002241205	A2	20020828	JP 2001-39858	20010216

PRIORITY APPLN. INFO.: JP 2001-39858 20010216
OTHER SOURCE(S): MARPAT 137:181103
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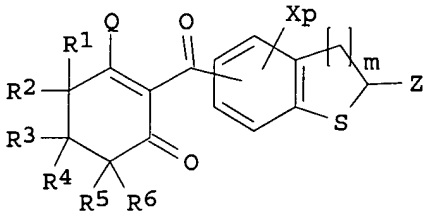
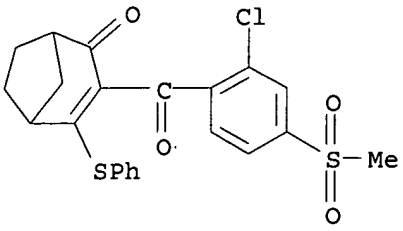


I

AB A **herbicide** effective against a large spectrum of weeds at a low concn. is presented, discriminating weeds from **crops**. A condensed cyclic benzoyl derivs. (I) and derivs. and salts thereof, where R1-R6 are H, halo, C1-6 alkyl, haloalkyl; Q = OH, halo, C1-6 alkoxy, alkylthio, alkyl-sulfinyl, alkylsulfonyl, phenoxy, phenyl-sulfinyl, phenylsulfonyl, C2-12 dialkylamino, etc.; X = halo, nitro, cyano; p = 0 - 2; Z = H, C1-6 alkyl, C3-6 cycloalkyl, etc.; m = 1-2; n = 0-2, in combination with **herbicides** against weeds and broad leaf weeds in the rice paddy.

IT **156963-66-5**, Benzobicyclon
RL: AGR (Agricultural use); BCP (Biochemical process); BIOL (Biological study); PROC (Process); USES (Uses)
(synergistic **herbicide** contg.)

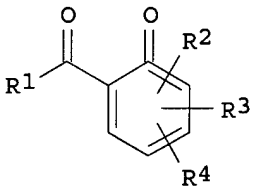
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 22 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:484651 CAPLUS
DOCUMENT NUMBER: 137:47003
TITLE: Preparation of arylketones by reacting active hydrogen compounds with benzoic acids in the presence of a phosphonic anhydride
INVENTOR(S): Hermann, Stefan
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 16 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10063493	A1	20020627	DE 2000-10063493	20001220

PRIORITY APPLN. INFO.: DE 2000-10063493 20001220
OTHER SOURCE(S): CASREACT 137:47003; MARPAT 137:47003
GI



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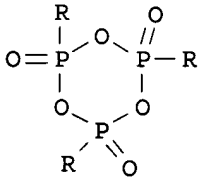
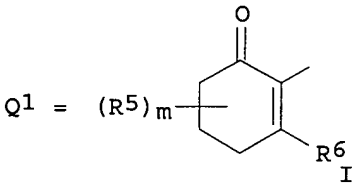


II



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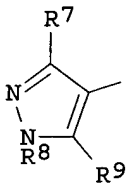
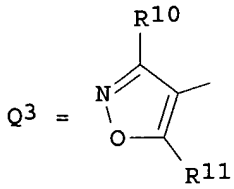




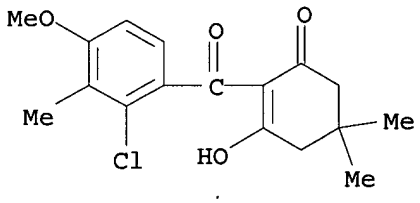
AB Title compds. [I; R1 = Q1-Q3, R12C(O)CHR13Me; m = 0-6; R5 = halo, (substituted) alkyl, alkylthio, aryl; and if m = 2, R5 = alkylene; R6 = OH, formyloxy, halo, (substituted) alkoxy, alkylthio, alkylsulfinyl, alkylsulfonyl, alkylcarbonyloxy, etc.; R7 = H, cyano, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, alkylsulfinyl, etc.; R8 = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkyl, etc.; R9 = OH, formyloxy, (substituted) alkoxy, alkylcarbonyloxy, etc.; R10 = H, cyano, carbamoyl, thiocarbamoyl, halo,

(substituted) alkyl, alkylcarbonyl, etc.; R11, R12 = H, (substituted) alkyl, cycloalkyl; R13 = H, cyano, carbamoyl, halo, (substituted) alkyl, alkoxy, alkoxycarbonyl; R2, R3 = H, NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, etc.; R4 = H, NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, etc.;], were prepd. as **herbicides** (no data). Prepn. of I results by reacting active hydrogen compds. R1H (R1 as above) with benzoic acids corresponding to I in the presence of a phosphonic anhydride II (R = (substituted) alkyl, aryl) and one or several reaction auxiliary agents in one or several aprotic solvents at -30.degree. to 150.degree. followed by sepn. of intermediates. Thus, 2-chloro-4-methoxy-3-methylbenzoic acid in CH2Cl2 was treated one after another with 5,5-dimethyl-1,3-cyclohexanedione, N-ethylmorpholine, 4-dimethylaminopyridine and 50% propanephosphonic anhydride in AcOEt followed by stirring for 15 h at room temp. to give 67% 3-[(2-chloro-4-methoxy-3-methylbenzoyl)oxy]-5,5-dimethyl-2-cyclohexen-1-one which was stirred with Et3N and Me2C(OH)CN in MeCN for 15 h at room temp. to give 80% 2-(2-chloro-4-methoxy-3-methylbenzoyl)-3-hydroxy-5,5-dimethyl-2-cyclohexen-1-one.

IT **438586-60-8P**
RL: IMF (Industrial manufacture); SPN (Synthetic preparation); PREP (Preparation)
(prepn. of arylketones by reacting active hydrogen compds. with benzoic acids in presence of phosphonic anhydride)

RN 438586-60-8 CAPLUS

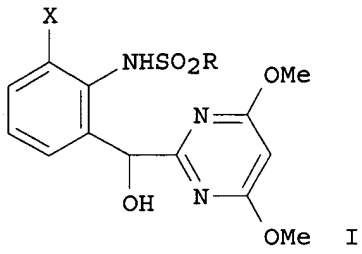
CN 2-Cyclohexen-1-one, 2-(2-chloro-4-methoxy-3-methylbenzoyl)-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 23 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:384277 CAPLUS
DOCUMENT NUMBER: 136:381757
TITLE: **Herbicide** compositions for rice paddies
INVENTOR(S): Otsuka, Takashi; Nishioka, Hitoshi; Oda, Yoshiki
PATENT ASSIGNEE(S): Nihon Nohyaku Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 9 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002145705	A2	20020522	JP 2001-264338	20010831

PRIORITY APPLN. INFO.: JP 2000-263779 A 20000831
OTHER SOURCE(S): MARPAT 136:381757
GI



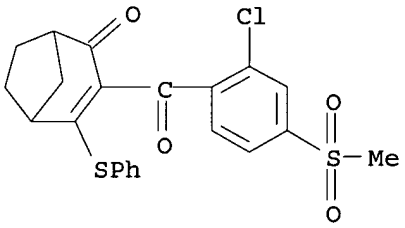
I

AB **Herbicides** effective against weeds resistant to sulfonylurea-type **herbicides**, contain indanofan, with a group of compds. such as clomeprop and naproanilide, and .gtoreq. 1 compd. selected from I where X = H, C1-6 alkyl, C1-6alkoxy C1-6 alkyl, trifluoromethyl; Me = Me.

IT **156963-66-5**, Benzobicyclon
RL: AGR (Agricultural use); BCP (Biochemical process); BIOL (Biological study); PROC (Process); USES (Uses)
(in **herbicide** compns. for rice paddies)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 24 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:171868 CAPLUS

DOCUMENT NUMBER: 136:216742

TITLE: Preparation of 2-[(isoxazol-3-yl)benzoyl]cyclohexane-1,3-diones as **herbicides**

INVENTOR(S): Van Almsick, Andreas; Willms, Lothar; Auler, Thomas; Bieringer, Hermann; Thuerwaechter, Felix

PATENT ASSIGNEE(S): Aventis Cropscience Gmbh, Germany

SOURCE: PCT Int. Appl., 104 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

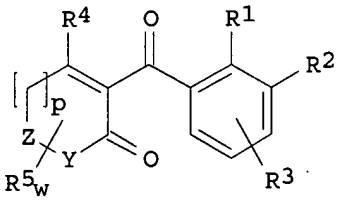
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002018352	A1	20020307	WO 2001-EP9601	20010821

W: AE, AG, AL, AM, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CN, CO, CR, CU, CZ, DM, DZ, EC, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, PH, PL, RO, RU, SG, SI, SK, TJ, TM, TT, UA, US, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF,

BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
DE 10043075 A1 20020314 DE 2000-10043075 20000901
AU 2001082108 A5 20020313 AU 2001-82108 20010821
US 2002173424 A1 20021121 US 2001-943040 20010830
PRIORITY APPLN. INFO.: DE 2000-10043075 A 20000901
WO 2001-EP9601 W 20010821
OTHER SOURCE(S): MARPAT 136:216742

GI



I

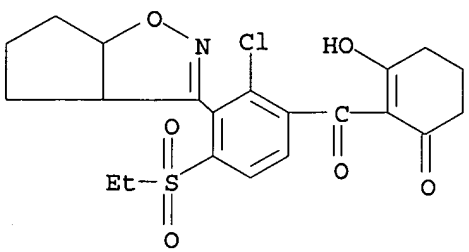
Copending appln

AB Title compds. [I; R1 = halo, (halo)alkyl, alkylsulfenyl, alkylsulfinyl, alkylsulfonyl, NO2; R2 = (substituted) bi-, tri-, or tetracyclic heteroaryl; R3 = halo, haloalkyl, alkylsulfenyl, alkylsulfinyl, alkylsulfonyl, NO2; R4 = OR7, (halo)alkylthio, (halo)alkenylthio, (halo)alkynylthio, (halo)alkylsulfinyl, etc.; R7 = H, (halo)alkyl, alkoxyalkyl, CHO, alkylcarbonyl, etc.; R5 = tetrahydropyran-3-yl, tetrahydropyran-4-yl, tetrahydrothiopyran-3-yl, alkyl, cycloalkyl, etc.; Y = O, S, NH, N-alkyl, CHR5, CR52; Z = O, S, SO, SO2, NH, N-alkyl, CHR5, CR52; p = 0, 1; w = 0-4], were prepd. Thus, 2-chloro-4-methylsulfonyl-3-(3a,4,5,6a-tetrahydrofuro[3,2-d]isoxazol-3-yl)benzoic acid (prepn. given) in CH2Cl2 was treated with (COCl)2 and DMF at room temp. followed by reflux for 1 h and dropwise addn. of 1,3-cyclohexanedione and Et3N in CH2Cl2 to give after 2 h stirring 87% 2-chloro-4-methylsulfonyl-3-(3a,4,5,6a-tetrahydrofuro[3,2-d]isoxazol-3-yl)benzoic acid 3-oxocyclohex-1-enyl ester. The resulting intermediate in MeCN was stirred with Et3N and acetone cyanohydrin for 16 h at room temp. to give 73% 2-[2-chloro-4-methylsulfonyl-3-(3a,4,5,6a-tetrahydrofuro[3,2-d]isoxazol-3-yl)benzoyl]cyclohexane-1,3-dione. The latter at 38-150 ppm postemergent gave 85-95% control of Setaria faberii and 70-90% control of Setaria virdis. The title compds. are esp. useful to combat of Setaria spp. on corn cultures.

IT **402478-50-6P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of (isoxazolylbenzoyl)cyclohexanediones as **herbicides**)

RN 402478-50-6 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(ethylsulfonyl)-3-(3a,5,6,6a-tetrahydro-4H-cyclopent[d]isoxazol-3-yl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 25 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:169485 CAPLUS
DOCUMENT NUMBER: 136:195627
TITLE: **Pesticide** compositions applicable to flooded rice paddy
INVENTOR(S): Okada, Hiroshi
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 11 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

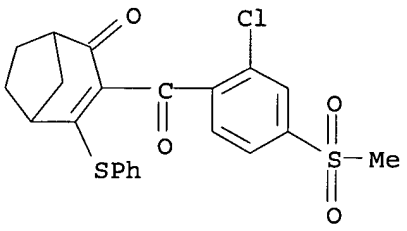
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002068903	A2	20020308	JP 2000-258778	20000829

PRIORITY APPLN. INFO.: JP 2000-258778 20000829

AB A **pesticide** compn. consists of a **pesticide**, a surfactant, an inorg. porous carrier with apparent d. .ltoreq. 1.0, water, etc., and is applicable to the surface of flooded paddies. Preferably, the d. of the compn. is .ltoreq. 0.95, the inorg. carrier is 5-30 % by wt., the **pesticide** is **herbicide** like Benzobicyclone, i.e.,3-(2-chloro-4-methylsulfonylbenzoyl)-4-phenylthio-bicyclo[3.2.1]octo-3-en-2-one. The compn. when applied to the water, spreads rapidly and suspended in water.

IT **156963-66-5**
RL: AGR (Agricultural use); BCP (Biochemical process); BIOL (Biological study); PROC (Process); USES (Uses)
(as **herbicide** applicable to flooded rice paddy)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 26 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:157489 CAPLUS
DOCUMENT NUMBER: 136:195645
TITLE: Synergistic herbicidal mixtures containing 2-phenyl-4-(hetero)aryloxypyrimidine
INVENTOR(S): Baltruschat, Helmut Siegfried; Brandt, Astrid
PATENT ASSIGNEE(S): Basf Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 57 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002015694	A2	20020228	WO 2001-EP9799	20010824
WO 2002015694	A3	20020620		

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

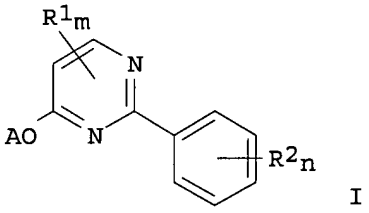
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

AU 2002010461	A5	20020304	AU 2002-10461	20010824
US 2002055435	A1	20020509	US 2001-938370	20010824

PRIORITY APPLN. INFO.: US 2000-228317P P 20000825
WO 2001-EP9799 W 20010824

OTHER SOURCE(S): MARPAT 136:195645

GI



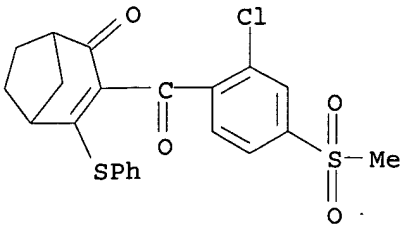
I

AB A herbicidal compn. comprises a herbicidally acceptable carrier and/or surface active agent and, as active ingredient, a synergistically effective amt. of (1) at least one 2-phenyl-4-(hetero)aryloxypyrimidine I (A = (un)substituted Ph, (un)substituted 5- or 6-membered nitrogen-contg. heteroarom., difluorobenzodioxolyl; m represents an = 0-2; n = 0-5; R1 = halo, (un)substituted alkyl, alkenyl, alkinyl, alkoxy, alkoxyalkyl, dialkoxyalkyl, alkoxyalkoxy, alkylthio, amino, alkylamino, dialkylamino, alkoxyamino or formamidino; R2 = halo, (un)substituted alkyl, alkenyl, alkinyl, haloalkyl, haloalkoxy, alkoxy, alkoxyalkyl, alkoxyalkoxy, alkylthio, haloalkylthio, nitro, cyano, SF5, alkylsulfonyl, or alkylsulfinyl) or its environmentally compatible salts;and (2) at least one addnl. herbicidal compd., which is active against broad-leaved weeds and/or annual grasses; and/or (3) at least one addnl. safening compd.

IT **156963-66-5D**, Benzobicyclon, mixts. with 2-phenyl-4-(hetero)aryloxypyrimidines
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns. contg.)

RN 156963-66-5 CAPLUS

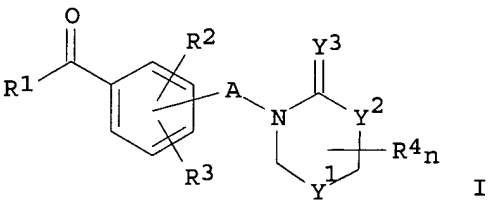
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 27 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:107336 CAPLUS
DOCUMENT NUMBER: 136:151159
TITLE: Preparation of heteroarylidene cyanamides as **herbicides**
INVENTOR(S): Mueller, Klaus-Helmut; Herrmann, Stefan; Hoischen, Dorothee; Lehr, Stefan; Schwarz, Hans-Georg; Schallner, Otto; Drewes, Mark Wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 85 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002010155	A1	20020207	WO 2001-EP8225	20010717
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10037149	A1	20020207	DE 2000-10037149	20000729

PRIORITY APPLN. INFO.: DE 2000-10037149 A 20000729
OTHER SOURCE(S): MARPAT 136:151159
GI



I

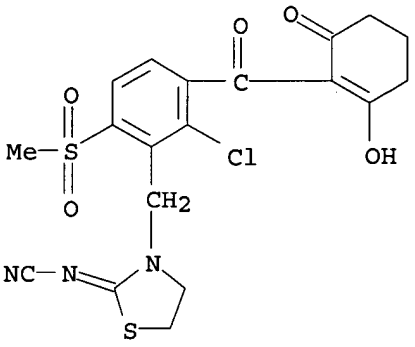
AB Title compds. [I; n = 0-4; A = alkylene; R1 = (substituted) 1-oxocyclohex-2-en-2-yl, 1H-pyrazol-4-yl, 4-isoxazolyl, alkylcarbonyl; R2, R3 = H, NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, etc.; R4 = (substituted) alkyl; Y1 = bond, O, S, NZ, (substituted) alkylene; Y2 = S, NZ; Y3 = NY4, NY4Y5, O; Y4 = H, cyano, NO2, (substituted) alkylcarbonyl, alkylsulfonyl, arylcarbonyl,

arylsulfonyl; Y5 = cyano, NO2, (substituted) alkylcarbonyl, alkylsulfonyl, arylcarbonyl, arylsulfonyl; Z = H, (substituted) alkyl, alkenyl, alkynyl], were prepd. Thus, a mixt. of 2-[(2-cyanoimino-1,3-thiazol-3-yl)methyl]-4-trifluoromethylbenzoic acid (prepn. given), 1,3-cyclohexanedione, and dicyclohexylcarbodiimide (DCC) in MeCN was stirred for 20 h at room temp. followed by addn. of Et3N and Me3SiCN and stirring for 2 h at room temp. to give 3-[2-([2,6-dioxocyclohexyl]carbonyl)-5-trifluoromethylbenzyl]-1,3-thiazol-2-ylidene cyanamide. I were said to show very strong pre- and postemergent herbicidal activity and good **crop** tolerance.

IT **395069-25-7P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of heteroarylidene cyanamides as **herbicides**)

RN 395069-25-7 CAPLUS

CN Cyanamide, [3-[[2-chloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]-6-(methylsulfonyl)phenyl]methyl]-2-thiazolidinylidene]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 28 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:31426 CAPLUS
DOCUMENT NUMBER: 136:102385
TITLE: Preparation and herbicidal efficacy of tetrazolyl-thioalkyl-phenyl derivatives
INVENTOR(S): Yanagi, Akihiko; Narabu, Shinichi; Goto, Toshio; Ueno, Chieko; Shirakura, Shinichi
PATENT ASSIGNEE(S): Nihon Bayer Agrochem K.K., Japan
SOURCE: PCT Int. Appl., 110 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002002536	A1	20020110	WO 2001-IB1130	20010625

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF,

BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
JP 2002080460 A2 20020319 JP 2001-143072 20010514
EP 1301492 A1 20030416 EP 2001-940913 20010625
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR
PRIORITY APPLN. INFO.: JP 2000-204914 A 20000706
JP 2001-143072 A 20010514
WO 2001-IB1130 W 20010625
OTHER SOURCE(S): MARPAT 136:102385

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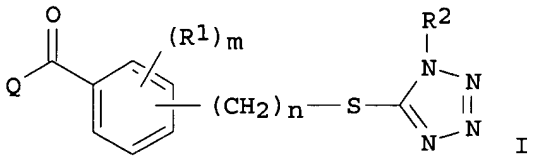

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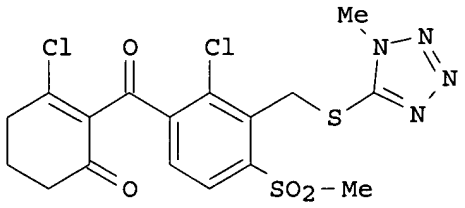


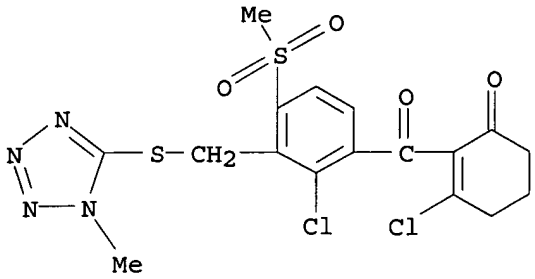
II

AB Title compds. I [R1 = halo, Me, Et, halomethyl, methoxy, ethoxy, haloalkoxy, methylthio, ethylthio alkylsulfonyl, methylsulfonyloxy, ethylsulfonyloxy, nitro or cyano; R2 = alkyl, (un)substituted cycloalkyl, m = 0 - 2; the two R1 substituents may be identical or different in case m = 2; n = 1 or 2; Q = (un)substituted 1,3-cyclohexanedion-2-yl or derivs. thereof] were prepd. E.g., 2-[2-chloro-4-methylsulfonyl-3-[[(1-methyl-1H-tetrazol-5-yl)thio]methyl]benzoyl]cyclohexane-1,3-dione was converted to II (CH2Cl2, ClCOCOCl, DMF, reflux, 3 h). Selected examples I, at the application rate of 0.25 kg/ha, exhibited an herbicidal effect of more than 90% against paddy field weeds (smallflower, bulrush, etc.) and were safe for the transplanted paddy rice.

IT **388111-99-7P**, 3-Chloro-2-[2-chloro-4-methylsulfonyl-3-[[(1-methyl-1H-tetrazol-5-yl)thio]methyl]benzoyl]-2-cyclohexen-1-one
RL: AGR (Agricultural use); BSU (Biological study, unclassified); RCT (Reactant); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)
(**herbicide**; novel tetrazole derivs.)

RN 388111-99-7 CAPLUS

CN 2-Cyclohexen-1-one, 3-chloro-2-[2-chloro-4-(methylsulfonyl)-3-[[(1-methyl-1H-tetrazol-5-yl)thio]methyl]benzoyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

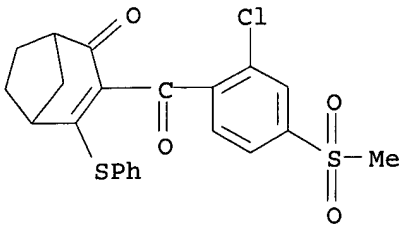
L7 ANSWER 29 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:31184 CAPLUS
DOCUMENT NUMBER: 136:81317
TITLE: Arylsulfonylaminocarbonyltriazole-based mixtures as selective **herbicides**
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Kremer, Mathias; Mueller, Klaus-Helmut
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 86 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002001957	A1	20020110	WO 2001-EP6840	20010618
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
DE 10031825	A1	20020110	DE 2000-10031825	20000630
EP 1303189	A1	20030423	EP 2001-940579	20010618
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: DE 2000-10031825 A 20000630
WO 2001-EP6840 W 20010618
OTHER SOURCE(S): MARPAT 136:81317

AB Synergistic herbicidal combinations comprise arylsulfonylaminocarbonyltriazoles and any of a large no. of known herbicidally effective compds. and/or safeners. The mixts. can be used with particular success for selective weed control in various **crops**. Thus, procarbazone sodium 30 and flufenacet 125 g/ha synergistically controlled Avena fatua and Amaranthus retroflexus.

IT **156963-66-5D**, Benzobicyclon, mixts. with arylsulfonylaminocarbonyltriazoles
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic **herbicides**)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)

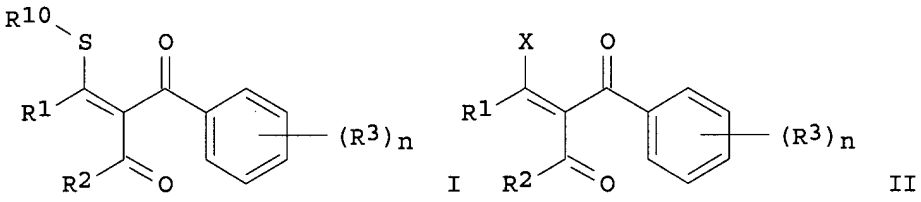


REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 30 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:23513 CAPLUS
DOCUMENT NUMBER: 136:85660
TITLE: Method for preparation of substituted benzoyl thio enol ether compound
INVENTOR(S): Kishi, Hideki; Tabuchi, Toshihiko; Komatsuhara, Kenichi
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 10 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002003467	A2	20020109	JP 2000-190633	20000626

PRIORITY APPLN. INFO.: JP 2000-190633 20000626
OTHER SOURCE(S): CASREACT 136:85660; MARPAT 136:85660
GI

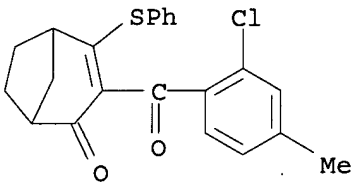


AB The title compds. [I; R1, R2 = (un)substituted C1-8 alkyl or R1 and R2 are taken together to represent CR4R5CR6R7CR8R9; R4-R9 = H or C1-4 alkyl or R4 and R6, R6 and R8, or R4 and R8 are taken together to represent C1-3 alkylene; n no. of R3 groups = halo, C1-4 alkyl, C1-4 alkoxy, C1-4 alkylthio, C2-5 alkoxymethyl, C2-5 alkoxycarbonyl, C1-3 alkanesulfonyl, C1-3 alkanesulfonyloxy, NO2 (wherein the alkyl moiety of R3 is optionally substituted by 1 or .gtoreq.2 halo); n = 0-5; R10 = C1-8 alkyl, C2-8 alkenyl, C2-8 alkynyl, C3-7 cycloalkyl, (un)substituted Ph or benzyl] are prepd. by thioetherification reaction of 3-halo-1-phenyl-2-propen-1-one derivs. (II; X = halo) with thiols of formula R10-SH (R10 = same as above) using tertiary amine as the catalyst in the presence of H2O and base in hydrophorbic org. solvent. This process is carried out in an inhomogeneous solvent system using base such as NaOH and a catalytic amt. of tertiary amine and gives in high yields in a short reaction time the compds. I of high purity which are useful as **herbicides**. Thus,

0.33 g DMF was added to a soln. of 16.0 g 3-(2-chloro-4-methylbenzoyl)bicyclo[3.2.1]octane-2,4-dione in 120 g CHCl3 and treated dropwise with 5.9 g SOCl2, and the resulting soln. was refluxed for 2 h, followed by concn. of the reaction mixt. under reduced pressure to quant. give 2-chloro-3-(2-chloro-4-methylbenzoyl)bicyclo[3.2.1]octan-2-en-4-one (III). Thiophenol (4.97 g) was added dropwsie to 8.0 g 25 wt.% aq. NaOH to give aq. soln. of thiophenol sodium salt to which was added 0.09 g Et3N, followed by adding dropwise a CHCl3 soln. of III (50 mL), and the resulting mixt. was stirred at room temp. for 1 h to give 93% 3-(2-chloro-4-methylbenzoyl)-2-phenylthiobicyclo[3.2.1]octan-2-en-4-one (.gtoreq.99% purity) vs. 79% yield and .gtoreq.99 purity when Et3N was not used.

IT **386743-57-3P**
RL: AGR (Agricultural use); IMF (Industrial manufacture); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of substituted benzoyl thio enol ether compds. as **herbicides** by thioetherification of halophenylpropenone derivs. with thiols in presence of tertiary amine)

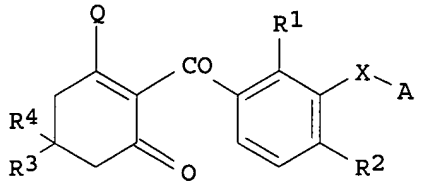
RN 386743-57-3 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-(2-chloro-4-methylbenzoyl)-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 31 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:874399 CAPLUS
DOCUMENT NUMBER: 136:5744
TITLE: Preparation method of cyclohexenones and use as **herbicides**
INVENTOR(S): Nakamura, Yuji; Palmer, Christopher John; Kikugawa, Hiroshi; Sano, Makiko; Ono, Ken
PATENT ASSIGNEE(S): Ishihara Sangyo Kaisha, Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 43 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2001335573	A2	20011204	JP 2000-154970	20000525

PRIORITY APPLN. INFO.: JP 2000-154970 20000525
OTHER SOURCE(S): CASREACT 136:5744; MARPAT 136:5744
GI



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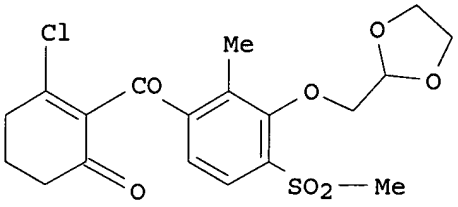


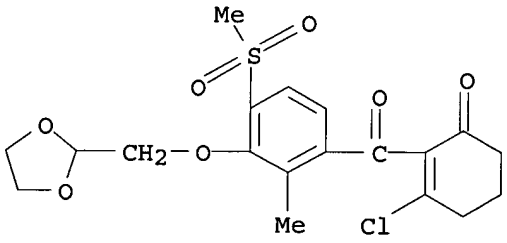
II

AB Title compds. [I; X = alkylenyloxy, alkylenylthioxy; A = heterocyclyl; Q = halo, O(CH2)nR5; R1 = H, alkyl; R2 = H, alkyl; R3 = H, alkyl; R4 = H, alkyl] and salts are prepd. as the active component of **herbicides**. Thus, the title compd. II was prepd. and in vivo tested.

IT **376418-18-7P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); BUU (Biological use, unclassified); RCT (Reactant); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)
(prepn. method of cyclohexenones and use as **herbicides**)

RN 376418-18-7 CAPLUS

CN 2-Cyclohexen-1-one, 3-chloro-2-[3-(1,3-dioxolan-2-ylmethoxy)-2-methyl-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 32 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2001:868138 CAPLUS

DOCUMENT NUMBER: 136:1861

TITLE: Synergistic selective thiadiazolyloxyacetamides-based **herbicide** compositions

INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark Wilhelm; Pontzen, Rolf; Kremer, Mathias

PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 34 pp.
CODEN: PIXXD2

09/ 943,037

DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001089301	A1	20011129	WO 2001-EP5242	20010509
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
DE 10041619	A1	20011129	DE 2000-10041619	20000824
EP 1298996	A1	20030409	EP 2001-943335	20010509
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: DE 2000-10025306 A 20000522
DE 2000-10041619 A 20000824
WO 2001-EP5242 W 20010509

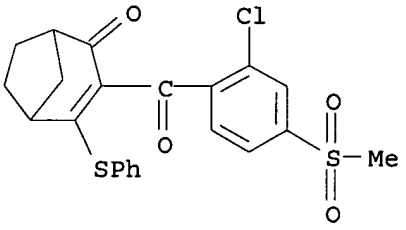
OTHER SOURCE(S): MARPAT 136:1861

AB The invention relates to herbicidal synergistic selective combinations which consist of thiadiazolyloxyacetamide deriv. HetOCH2CONRAr [Ar = halo, alkyl or haloalkylphenyl; Het = (un)substituted thiadiazolyl; R = alkyl, alkenyl or alkynyl], preferably flufenacet, and known **herbicides** and optionally safeners.

IT **156963-66-5D**, Benzobicyclon, mixts. with thiadiazolyloxyacetamide derivs.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic selective **herbicides**)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 33 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:851133 CAPLUS
DOCUMENT NUMBER: 135:371736
TITLE: Preparation of 3-(4,5-dihydroisoxazol-5-yl)benzoylcyclohexenones as **herbicides**
INVENTOR(S): Baumann, Ernst; Von Deyn, Wolfgang; Kudis, Steffen; Langemann, Klaus; Mayer, Guido; Misslitz, Ulf; Neidlein, Ulf; Walter, Helmut; Zagar, Cyrill; Witschel, Matthias
PATENT ASSIGNEE(S): Basf Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 125 pp.

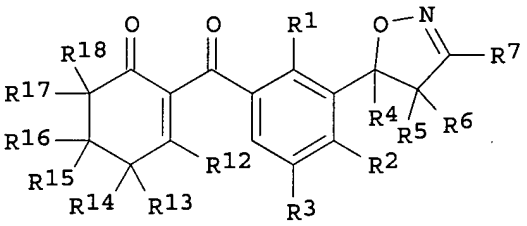
09/ 943,037

CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001087856	A1	20011122	WO 2001-EP5390	20010511
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
EP 1284969	A1	20030226	EP 2001-936353	20010511
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: DE 2000-10024107 A 20000518
WO 2001-EP5390 W 20010511

OTHER SOURCE(S): MARPAT 135:371736
GI



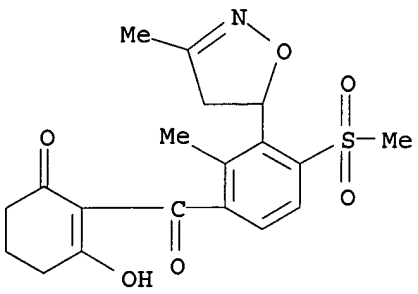
I

AB Title compds. [I; R1, R2 = H, NO2, halo, cyano, alkyl, haloalkyl, alkoxy, haloalkoxy, alkylthio, haloalkylthio, etc.; R3 = H, halo, alkyl; R4 = H, alkyl; R5, R6 = H, halo, cyano, NO2, alkyl, alkoxyalkyl, dialkoxyalkyl, etc.; R5R6 = (substituted) (O-, N-interrupted) alkylene; R7 = halo, cyano, OH, alkyl, haloalkyl, alkoxy, haloalkoxy, alkylthio, etc.; R12 = OH, SH, halo, etc.; R13, R17 = H, alkyl, alkylthio, alkoxycarbonyl, etc.; R14, R16, R18 = H, alkyl, etc.; R15 = H, OH, halo, alkyl, haloalkyl, etc.], were prepd. Thus, a soln. of 1-hydroxycyclohex-1-en-3-one and Et3N in MeCN at 0-5.degree. was treated dropwise with 2-methyl-3-(3-methyl-4,5-dihydroisoxazol-5-yl)-4-methylsulfonylbenzoyl chloride in MeCN followed by stirring for 3 h at room temp. and addn. of Et3N and Me3SiCN to give after 12 h stirring 43% 2-[2-methyl-3-(3-methyl-4,5-dihydroisoxazol-5-yl)-4-methylsulfonylbenzoyl]-3-hydroxycyclohex-2-en-1-one. Several I at 125 or at 62.5 ppm were said to show very good pre- and postemergent herbicidal activity on Chenopodium album, etc.

IT **374076-76-3P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of dihydroisoxazolylbenzoylcyclohexenones as **herbicides**
)

RN 374076-76-3 CAPLUS
CN 2-Cyclohexen-1-one, 2-[3-(4,5-dihydro-3-methyl-5-isoxazolyl)-2-methyl-4-

(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)

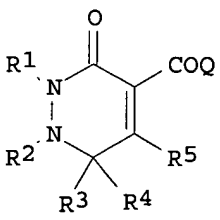


REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 34 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:755597 CAPLUS
DOCUMENT NUMBER: 135:299958
TITLE: Dihydropyridazinones and **herbicides** containing them
INVENTOR(S): Onari, Masatoshi; Watanabe, Hisayuki; Mikajima, Takumi; Ogoshi, Akiyoshi; Sato, Jun; Morimoto, Katsuyuki; Watanabe, Shigeomi; Nakahira, Kunimitsu; Hamada, Nobuyuki; Oki, Toru; Noguchi, Junko
PATENT ASSIGNEE(S): Nissan Chemical Industries, Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 27 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2001288173	A2	20011016	JP 2000-101705	20000404

PRIORITY APPLN. INFO.: JP 2000-101705 20000404
OTHER SOURCE(S): MARPAT 135:299958
GI



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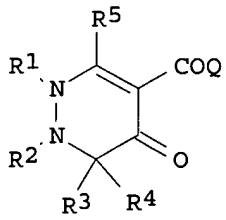


II

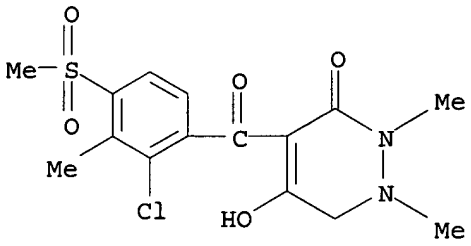
AB **Herbicides** contain dihydropyridazinones I or II [Q = aryl; R1, R2 = H, C1-6 alkyl, alkenyl, alkynyl, (un)substituted Ph, alkoxycarbonyl, etc.; R3, R4 = H, C1-6 alkyl, alkenyl, alkynyl, halo, (un)substituted Ph, etc.; R5 = OR15, S(O)nR16, halo; R15 = H, C1-6 alkyl, alkenyl, alkynyl, haloalkyl, alkoxyalkyl, etc.; R16 = C1-6 alkyl, alkenyl, alkynyl, haloalkyl, (un)substituted Ph, etc.; n = 0-2]. 1,2-Dimethylhexahydropyridazine-3,5-dione (prepn. given) was condensed with 2-chloro-4-(methylsulfonyl)-3-methylbenzoic acid chloride and rearranged to give I (R1 = R2 = Me, R3 = R4 = H, R5 = OH, Q = C6H2ClMeSO2Me-2,3,4),

which was applied to soil to show .gtoreq.90% control of Amaranthus retroflexus, Chenopodium album, and Stellaria media with <5% damage on corn and wheat.

IT **366795-31-5P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of dihydropyridazinones as **herbicides**)

RN 366795-31-5 CAPLUS

CN 3(2H)-Pyridazinone, 4-[2-chloro-3-methyl-4-(methylsulfonyl)benzoyl]-1,6-dihydro-5-hydroxy-1,2-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 35 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2001:676750 CAPLUS

DOCUMENT NUMBER: 135:242141

TITLE: Acylated phenyl or pyridine **herbicides**

INVENTOR(S): Luethy, Christoph; Schaetzer, Juergen; Edmunds, Andrew

PATENT ASSIGNEE(S): Syngenta Participations A.-G., Switz.

SOURCE: PCT Int. Appl., 64 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001066522	A1	20010913	WO 2001-EP2581	20010307

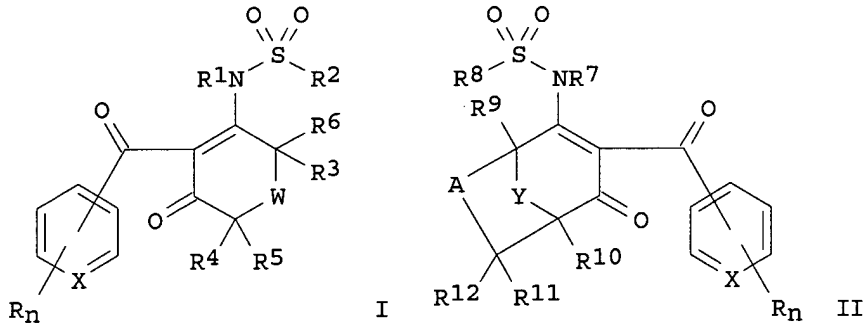
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: CH 2000-465 A 20000309

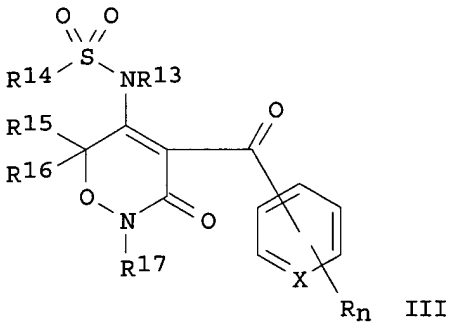
OTHER SOURCE(S): MARPAT 135:242141

GI

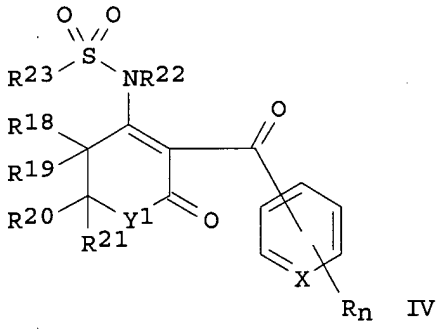


I

II



III



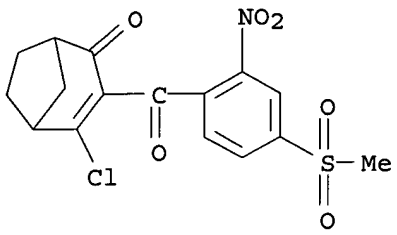
IV

AB The acylbenzenes and pyridines I [X = CH, N, N(O); n = 1-4; W = O, S, SO, SO2, CH, CO, substituted NH, etc.; R = H, (un)substituted alkyl, alkenyl, alkynyl, alkylsulfinyl, alkylamino, sulfonamido, NO2, cyano, halo, HO, HCO, etc.; R1 = H, alkyl; R2 = (un)substituted alkyl haloalkyl, alkenyl, Ph, benzyl, monocyclic/bicyclic ring contg. 1-4 hetero atoms, etc.; R3-R6 = H, (un)substituted H, alkyl alkenyl, alkylsulfonyloxy, halo, NO2, etc.], II [X = CH, N, N(O); n = 1-4; Y = bond, alkylene, CO, O, S, SO, etc.; A = (un)substituted alkylene; R7 = H, alkyl; R8 = (un)substituted alkyl, alkenyl, alkynyl, cycloalkyl, amino, Ph, etc.; R9-R12 = H, Me, alkoxycarbonyl, alkoxy, alkylsulfonyl, etc], III [X = CH, N, N(O); n = 1-4; R14 = H, alkyl; R15 = alkyl, haloalkyl, phenylvinyl, alkynyl, benzoyloxyalkyl, formylalkyl, etc; R15, R16 = H, alkyl, alkenyl, alkylthio, amino, etc; R17 = H, alkyl, (un)substituted Ph, benzyl, etc.] and IV [X = CH, N, N(O); n = 1-4; R18-R21 = H, hydroxyalkyl, alkyl, alkenyl, haloalkoxy, etc.; R22 = H, alkyl; R23 = alkyl, haloalkyl, cycloalkyl, alkylamino, benzyl, Ph, monocyclic/bicyclic ring with 1-4 hetero atoms, etc.] were prepd. and were useful as preemergence **herbicides** against, e.g., Setaria, Panicum, and Digitaria. Thus, treatment of F3CSO2NH2 with NaH in N-methylpyrrolidone and then with 4-chloro-3-(4-methylsulfonyl-2-nitrobenzoyl)bicyclo[3.2.1]oct-3-en-2-one gave trifluoro-N-[3-(4-methylsulfonyl-2-nitrobenzoyl)-4-oxobicyclo[3.2.1]oct-3-en-2-yl]methanesulfonamide.

IT **156963-90-5**
RL: RCT (Reactant); RACT (Reactant or reagent)
(prepn. and herbicidal activity of acylbenzenes and acylpyridines)

RN 156963-90-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 4-chloro-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)

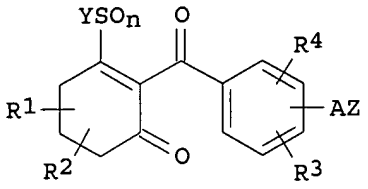


REFERENCE COUNT: 9 THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 36 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:676203 CAPLUS
DOCUMENT NUMBER: 135:227001
TITLE: Preparation of 2-(heterocyclylmethylbenzoyl)cyclohexenones as **herbicides**
INVENTOR(S): Mueller, Klaus-Helmut; Schwarz, Hans-Georg; Herrmann, Stefan; Hoischen, Dorothee; Lehr, Stefan; Schallner, Otto; Drewes, Mark Wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf; Yanagi, Akihiko; Narabu, Shinichi; Goto, Toshio; Ito, Seishi; Ueno, Chieko
PATENT ASSIGNEE(S): Bayer A.-G., Germany; Nihon Bayer Agrochem K.K.
SOURCE: Ger. Offen., 94 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10028687	A1	20010913	DE 2000-10028687	20000609
WO 2001066527	A1	20010913	WO 2001-EP2279	20010301
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
EP 1263738	A1	20021211	EP 2001-931488	20010301
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: DE 2000-10010937 A1 20000306
DE 2000-10028687 A 20000609
WO 2001-EP2279 W 20010301
OTHER SOURCE(S): MARPAT 135:227001
GI



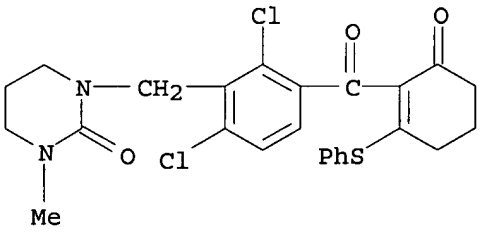
I

AB Title compds. [I; n = 0-2; A = bond, alkylene; R1 = H, Ph, (substituted) alkyl; R2 = H, (substituted) alkyl; R1R2 = alkylene, etc.; R3, R4 = H, NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, etc.; Y = H, (substituted) alkyl, alkenyl, alkynyl, aryl, arylalkyl; Z = (substituted) heterocyclyl], were prepd. as **herbicides** (no data). Thus, a mixt. of 2-[2,4-dichloro-3-[(3-methyl-2-oxotetrahydro-1(2H)-pyrimidinyl)methyl]benzoyl]cyclohexane-1,3-dione, (COCl)2, and DMF in CH2Cl2 was refluxed followed by treatment with PhSH and Et3N to give 61% 1-[2,6-dichloro-3-[(6-oxo-2-phenylthio-1-cyclohexenyl)carbonyl]benzyl]-3-methyltetrahydro-2(1H)-pyrimidinone. I were said to show very strong pre- and postemergent herbicidal activity and good **crop** tolerance.

IT **358969-19-4P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of heterocyclylmethylbenzoylcyclohexenones as **herbicides**)

RN 358969-19-4 CAPLUS

CN 2(1H)-Pyrimidinone, 1-[[2,6-dichloro-3-[[6-oxo-2-(phenylthio)-1-cyclohexen-1-yl]carbonyl]phenyl]methyl]tetrahydro-3-methyl- (9CI) (CA INDEX NAME)



L7 ANSWER 37 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:628686 CAPLUS
DOCUMENT NUMBER: 135:176748
TITLE: Additives to **herbicides**
INVENTOR(S): Breen, John G.; Shiraishi, Ikuo
PATENT ASSIGNEE(S): Dow Chemical Japan Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2001233718	A2	20010828	JP 2000-50489	20000222

PRIORITY APPLN. INFO.: JP 2000-50489 20000222
OTHER SOURCE(S): MARPAT 135:176748

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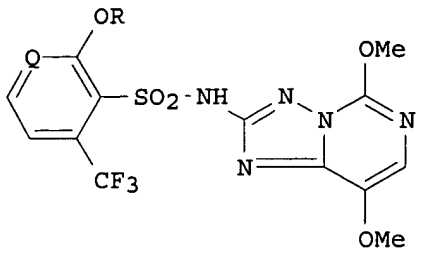
GI



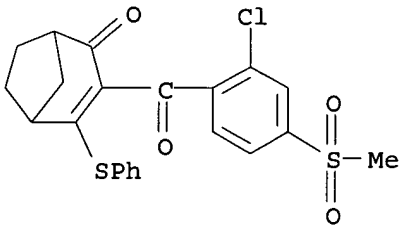
I

AB N-((1,2,4)-triazolo[1,5-c]pyrimidin-2-yl)pyrimidinesulfonamide or -benzenesulfonamide (I) where Q = CH, or N; R = lower chain hydrocarbon with .gtoreq. 1 halo, O, are added to **herbicides** that may be applied to the soil as well as to **plant** leaves. The combined **herbicides** are effective against a wide spectrum of weeds for wider application period with relatively small amts., as compared to conventional **herbicides**.

IT **156963-66-5**, Benzobicyclon
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(additives to herbicidal)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 38 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:627306 CAPLUS
DOCUMENT NUMBER: 135:185202
TITLE: Cosmetic thinning compositions for the face containing keratoline and an lipogenesis inhibitors
INVENTOR(S): Courtin, Olivier
PATENT ASSIGNEE(S): Laboratoires Clarins, Fr.
SOURCE: Fr. Demande, 14 pp.
CODEN: FRXXBL
DOCUMENT TYPE: Patent
LANGUAGE: French
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
FR 2801789	A1	20010608	FR 1999-15206	19991202
FR 2801789	B1	20020920		

PRIORITY APPLN. INFO.: FR 1999-15206 19991202

AB The title compns. are claimed. The lipogenesis inhibitor is an ext. of a **plant** rich in hydroxycitrate, such as Garcinia Cambodia fruit ext.

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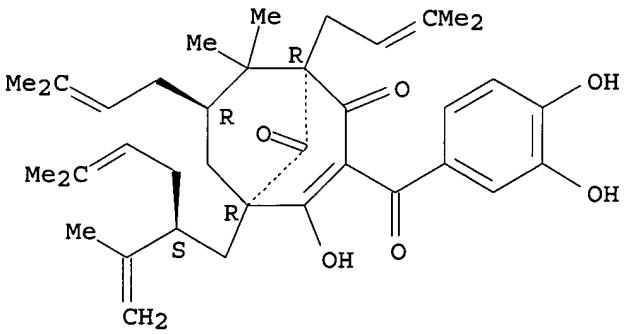
A lotion contained glycerin 3.000, sequestering agent 0.300, chest nut ext. 1.000, Ginkgo biloba ext. 1.000, butcher's broom 1.000, garcinol 1.000, caffeine 0.500, keratoline 0.500, silicon derivs. 3.000, solubilizers 1.000, perfume 0.500, preservatives 0.500, and water q.s. 100%.

IT **78824-30-3**, Garcinol
RL: BUU (Biological use, unclassified); BIOL (Biological study); USES (Uses)
(cosmetic thinning compns. for face contg. keratoline and lipogenesis inhibitors)

RN 78824-30-3 CAPLUS

CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L7 ANSWER 39 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:523547 CAPLUS
DOCUMENT NUMBER: 135:92638
TITLE: Preparation of 4-[3-[2-(1H-triazolin-1-yl)alkoxy]benzoyl]-1H-pyrazoles as **herbicides**
INVENTOR(S): Schallner, Otto; Lehr, Stefan; Schwarz, Hans-Georg; Mueller, Klaus-Helmut; Hoischen, Dorothee; Drewes, Mark Wilhelm; Dahmen, Peter; Feucht, Dieter; Pontzen, Rolf; Yanagi, Akihiko; Narabu, Shinichi; Goto, Toshio
PATENT ASSIGNEE(S): Bayer A.-G., Germany; Nihon Bayer Agrochem K.K.
SOURCE: Ger. Offen., 54 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 10039723	A1	20010719	DE 2000-10039723	20000814
WO 2001053275	A2	20010726	WO 2001-EP92	20010105
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
BR 2001007624	A	20021112	BR 2001-7624	20010105

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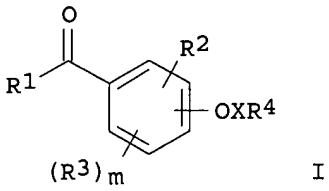
PRIORITY APPLN. INFO.: DE 2000-10001588 A1 20000117
DE 2000-10039723 A 20000814
WO 2001-EP92 W 20010105

OTHER SOURCE(S): MARPAT 135:92638

GI



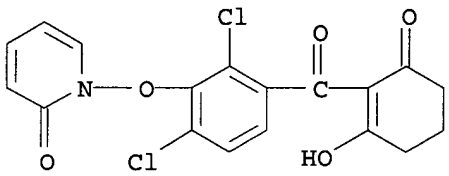
I

AB Title compds. [I; R1 = (substituted) dioxocycloalkyl, oxazolyl, pyrazolyl, alkylcarbonyl; R2 = H, NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, etc.; R3 = NO2, cyano, CO2H, carbamoyl, thiocarbamoyl, halo, (substituted) alkyl, alkoxy, alkylthio, alkylsulfinyl, etc.; R4 = (substituted) mono- or bicyclic heterocyclyl; X = alkylene; n = 0-2] were prepd. as **herbicides** (no data). Thus, 3-[2-(3,4-dimethyl-1,2,4-1H-triazolin-5-on-1-yl)ethoxy]-2-methyl-4-methylsulfonylbenzoyl chloride (analog prepn. given) in CH2Cl2 was treated with 1-ethyl-5-hydroxypyrazole, Et3N, and 1 drop of DMF followed by stirring for 24 h at 20.degree. to give 88% 4-[3-[2-(3,4-dimethyl-1,2,4-1H-triazolin-5-on-1-yl)ethoxy]-2-methyl-4-methylsulfonylbenzoyl]-1-ethyl-5-hydroxy-1H-pyrazole. I were said to show very strong pre- and postemergent herbicidal activity and good **crop** tolerance.

IT **349478-82-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of triazolinylalkoxybenzoylpyrazoles as **herbicides**)

RN 349478-82-6 CAPLUS

CN 2(1H)-Pyridinone, 1-[2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]phenoxy]- (9CI) (CA INDEX NAME)



L7 ANSWER 40 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2001:416915 CAPLUS

DOCUMENT NUMBER: 135:5609

TITLE: Preparation of 2-[2-methyl-3-(2-oxa-3-azabicyclo[3.1.0]hex-3-en-4-yl)-4-methylsulfonylbenzoyl]-1-hydroxycyclohex-1-en-3-ones as **herbicides**

INVENTOR(S): Kudis, Steffen; Baumann, Ernst; Von Deyn, Wolfgang; Langemann, Klaus; Mayer, Guido; Misslitz, Ulf; Neidlein, Ulf; Witschel, Matthias; Westphalen, Karl-Otto; Walter, Helmut

PATENT ASSIGNEE(S): Basf Aktiengesellschaft, Germany

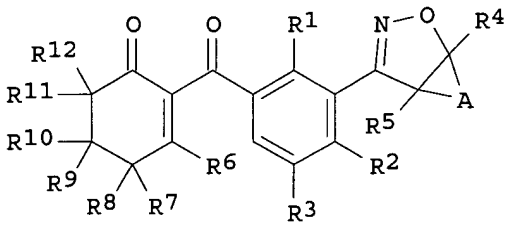
09/ 943,037

SOURCE: PCT Int. Appl., 62 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001040200	A1	20010607	WO 2000-EP11907	20001129
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
EP 1242393	A1	20020925	EP 2000-977591	20001129
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, MC, IE, SI, LT, LV, FI, RO, MK, CY, AL				

PRIORITY APPLN. INFO.: DE 1999-19958033 A 19991202
WO 2000-EP11907 W 20001129

OTHER SOURCE(S): MARPAT 135:5609
GI



I

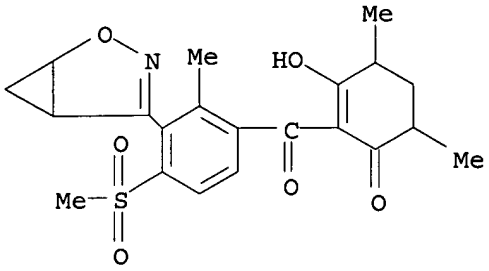
AB Title compds. [I; A = (substituted) alkylene; R1 = alkyl, haloalkyl, alkoxy, haloalkoxy, halo, NO2; R2 = alkyl, haloalkyl, alkoxy, haloalkoxy, alkylthio, haloalkylthio, etc.; R3 = H, alkyl, halo; R4, R5 = H, alkyl, haloalkyl; R4R5 = (substituted) alkylene; R6 = OH, SH, halo, (substituted) alkoxy, alkylthio, etc.; R7, R11 = H, alkyl, alkylthio, alkoxycarbonyl; R8, R10, R12 = H, alkyl; R9 = H, OH, halo, alkyl, haloalkyl, etc.; R7R8, R11R12, R8R9, R9R12, R8R12 = (substituted) alkylene; R9R10 = O, (substituted) O(CH2)mO, O(CH2)mS, S(CH2)mS, O(CH2)n, S(CH2)n; m = 2-4, n = 1-5; R13 = alkyl, alkenyl, haloalkenyl, alkynyl, cycloalkyl, alkylcarbonyl, etc.; R14 = (substituted) alkyl, alkenyl, haloalkenyl, alkynyl, cycloalkyl] and salts thereof, were prepd. as **herbicides** (no data). Thus, 2-[2-methyl-3-(5-chloromethyl-4,5-dihydroisoxazol-3-yl)-4-methylsulfonylbenzoyl]-1-hydroxy-4,6-dimethylcyclohex-1-en-3-one in DMSO was stirred with Me3COK for 12 h at room temp. followed by treatment with 3% HCl to give 63% 2-[2-methyl-3-(2-oxa-3-azabicyclo[3.1.0]hex-3-en-4-yl)-4-methylsulfonylbenzoyl]-1-hydroxy-4,6-dimethylcyclohex-1-en-3-one. Several I at 125 ppm or at 250 ppm postemergent were said to show very good control of Abutilon theophrasti, Avena fatua, Brachiara **plantaginea**, Chenopodium album, Echinochloa crus-galli, and Polygonum persicaria.

IT **342375-71-7P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)

(prepn. of methyloxaazabicyclohexenylmethylsulfonylbenzoylhydroxycycloh exenones as **herbicides**)

RN 342375-71-7 CAPLUS

CN 2-Cyclohexen-1-one, 3-hydroxy-4,6-dimethyl-2-[2-methyl-4-(methylsulfonyl)-3-(2-oxa-3-azabicyclo[3.1.0]hex-3-en-4-yl)benzoyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 41 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2001:416914 CAPLUS

DOCUMENT NUMBER: 135:19628

TITLE: Preparation of 2-(2-methyl-3-isoxazol-3-yl-4-methylsulfonylbenzoyl)cyclohexane-1,3-diones as **herbicides**

INVENTOR(S): Kudis, Steffen; Baumann, Ernst; Von Deyn, Wolfgang; Langemann, Klaus; Mayer, Guido; Misslitz, Ulf; Neidlein, Ulf; Witschel, Matthias; Westphalen, Karl-Otto; Walter, Helmut

PATENT ASSIGNEE(S): Basf Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 61 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001040199	A1	20010607	WO 2000-EP11818	20001127
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
EP 1237881	A1	20020911	EP 2000-977583	20001127
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: DE 1999-19958034 A 19991202
WO 2000-EP11818 W 20001127

OTHER SOURCE(S): MARPAT 135:19628

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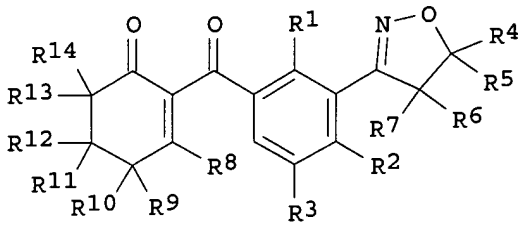


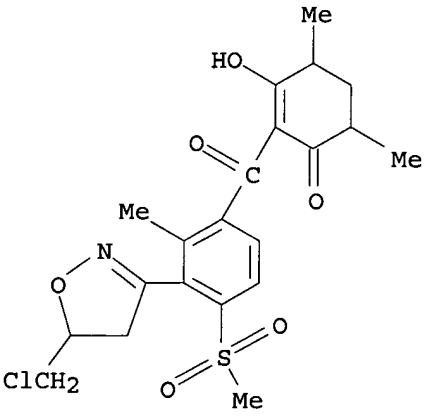
I

AB Title compds. [I; R1 = alkyl, haloalkyl, alkoxy, haloalkoxy; R2 = alkyl, haloalkyl, alkoxy, haloalkoxy, alkylthio, etc.; R3 = H, alkyl, halo; R4 = haloalkyl; R5, R6, R7 = H, alkyl, haloalkyl; R8 = OH, SH, halo, (substituted) alkoxy, alkylthio, etc.; R9, R13 = H, alkyl, alkylthio, alkoxycarbonyl; R10, R12, R14 = H, alkyl; R11 = H, OH, halo, alkyl, haloalkyl, etc.; or R9R10, R13R14, R10R11, R11R14, R10R14 = (substituted) alkylene; R11R12 = (substituted) O(CH2)mO, O(CH2)mS, S(CH2)mS, O(CH2)n, S(CH2)n; m = 2-4, n = 1-5; R11R12 = O] and salts thereof were prepd. as **herbicides** (no data). Thus, bicyclo[3.2.1]octane-2,4-dione and Et3N in MeCN were treated dropwise at 0-5.degree. with 2-methyl-3-(chloromethyl-4,5-dihydroisoxazol-3-yl)-4-methylsulfonylbenzoyl chloride (prepn. given) in MeCN and stirred together for 4 h at room temp. followed by addn. of K2CO3 and 1 drop of Me3SiCN, and stirring for 4 h at 40.degree. and for 12 h at room temp. to give 44% 2-methyl-3-(5-chloromethyl-4,5-dihydroisoxazol-3-yl)-4-methylsulfonylbenzoyl chloride. Several I at 125 ppm or at 250 ppm postemergent were said to show very good control of Abutilon theophrasti, Avena fatua, Brachiaria **plantaginea**, Chenopodium album, Polygonum persicaria, and Seteria faberi.

IT **342375-72-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of methylisoxazolylmethylsulfonylbenzoylcyclohexanediones as **herbicides**)

RN 342375-72-8 CAPLUS

CN 2-Cyclohexen-1-one, 2-[3-[5-(chloromethyl)-4,5-dihydro-3-isoxazolyl]-2-methyl-4-(methylsulfonyl)benzoyl]-3-hydroxy-4,6-dimethyl- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 42 OF 149 CAPLUS COPYRIGHT 2003 ACS

09/ 943,037

ACCESSION NUMBER: 2001:416449 CAPLUS
DOCUMENT NUMBER: 135:15440
TITLE: Synergistic herbicidal compositions comprising N-aryluracils
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Drewes, Mark-Wilhelm; Krauskopf, Birgit; Kremer, Mathias; Pontzen, Rolf; Wetcholowsky, Ingo; Andree, Roland
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 38 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19958381	A1	20010607	DE 1999-19958381	19991203
WO 2001039597	A2	20010607	WO 2000-EP11833	20001121
WO 2001039597	A3	20021031		

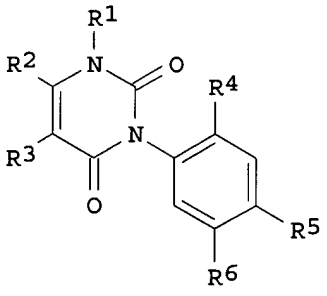
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

BR 2000016120	A	20020827	BR 2000-16120	20001121
EP 1278413	A2	20030129	EP 2000-989897	20001121

R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR

PRIORITY APPLN. INFO.: DE 1999-19958381 A 19991203
WO 2000-EP11833 W 20001121
OTHER SOURCE(S): MARPAT 135:15440
GI

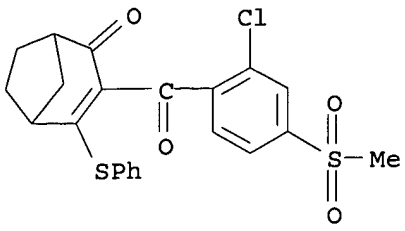


I

AB Synergistic herbicidal combinations comprise an N-aryluracil I [R1 = H, NH2 or (ub)substituted alkyl; R2 = (halo)alkyl; R3 = H, halo or (un)substituted alkyl; R4 = H, CN or halo; R5 = CN, thiocarbamoyl or halo; R6 = NO2, CN, CO2H, etc.] on one hand, and any of a large no. or known **herbicides** and optionally safeners, in the other hand.

IT **156963-66-5D**, Benzobicyclon, mixts. with N-acyluracils
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 43 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:375359 CAPLUS
DOCUMENT NUMBER: 134:362756
TITLE: Synergistic herbicidal compositions containing tritosulfuron
INVENTOR(S): Kremer, Mathias; Feucht, Dieter; Wellmann, Arndt; Dahmen, Peter; Krauskopf, Birgit
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 12 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19960918	A1	20010523	DE 1999-19960918	19991217
WO 2001035741	A2	20010525	WO 2000-EP11017	20001108
WO 2001035741	A3	20011227		
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
BR 2000015701	A	20020723	BR 2000-15701	20001108
EP 1233672	A2	20020828	EP 2000-971436	20001108
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

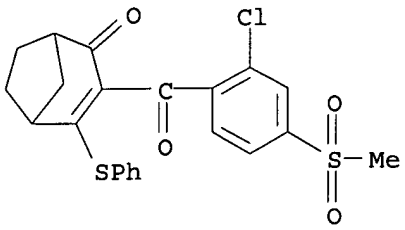
PRIORITY APPLN. INFO.: DE 1999-19955407 A1 19991118
DE 1999-19960918 A 19991217
WO 2000-EP11017 W 20001108

AB The invention concerns synergistic herbicidal combinations contg. tritosulfuron and any of a large no. of known **herbicides** and optionally safeners.

IT **156963-66-5D**, Benzobicyclon, mixts. contg. tritosulfuron and
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 44 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:375358 CAPLUS
DOCUMENT NUMBER: 134:362755
TITLE: Selective synergistic herbicidal compositions on basis of 2,6-disubstituted pyridine derivatives
INVENTOR(S): Kremer, Mathias; Feucht, Dieter; Wellmann, Arndt; Dahmen, Peter; Krauskopf, Birgit
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 14 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19960778	A1	20010523	DE 1999-19960778	19991216
WO 2001035740	A2	20010525	WO 2000-EP10917	20001106

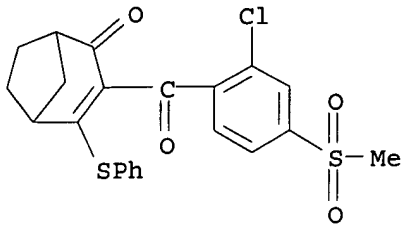
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

BR 2000015668	A	20020723	BR 2000-15668	20001106

PRIORITY APPLN. INFO.:
DE 1999-19955128 A1 19991117
DE 1999-19960778 A 19991216
WO 2000-EP10917 W 20001106
OTHER SOURCE(S): MARPAT 134:362755

AB The invention concerns new synergistic herbicidal compns. comprising known 2,6-disubstituted pyridine derivs. (Markush given), such as picolinafen, on the one hand and any of a large no. of known **herbicides** and/or safeners, on the other hand. The compns. are esp. useful in cereals.

IT **156963-66-5D**, Benzobicyclon, mixts. with pyridine derivs.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(selective synergistic herbicidal compns.)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



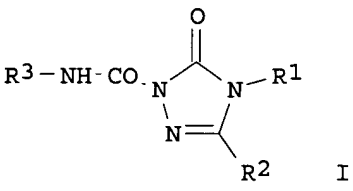
L7 ANSWER 45 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:375340 CAPLUS
DOCUMENT NUMBER: 134:362754
TITLE: Synergistic herbicidal compositions comprising carbamoyltriazolinones
INVENTOR(S): Feucht, Dieter; Dahmen, Peter; Wilhelm, Mark; Pontzen, Rolf; Kremer, Mathias; Mueller, Klaus-helmut
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 12 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19955662	A1	20010523	DE 1999-19955662	19991119
WO 2001037652	A2	20010531	WO 2000-EP10975	20001107
WO 2001037652	A3	20020124		

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

AU 2001015194	A5	20010604	AU 2001-15194	20001107
BR 2000015670	A	20020723	BR 2000-15670	20001107

PRIORITY APPLN. INFO.: DE 1999-19955662 A 19991119
WO 2000-EP10975 W 20001107
OTHER SOURCE(S): MARPAT 134:362754
GI



I

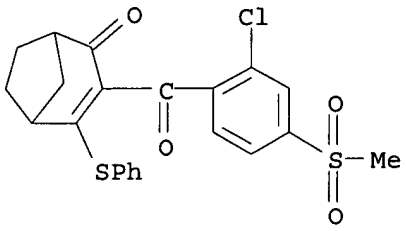
AB Synergistic herbicidal compns. comprise carbamoyltriazolinone derivs. I [R1 = H, OH, NH2, (un)substituted alkyl, alkenyl, alkynyl, etc.; R2 = (un)substituted alkyl, alkenyl, alkynyl, alkoxy, alkylamino, cycloalkyl, aryl, etc.; R3 = (un)substituted alkyl, alkenyl, alkynyl, cycloalkyl,

etc.] and any of a large no. of known **herbicides** and optionally safeners.

IT **156963-66-5D**, Benzobicyclon, mixts. with carbamoyltriazolinones
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compns.)

RN 156963-66-5 CAPLUS

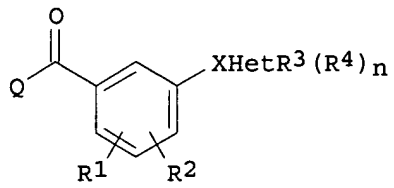
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



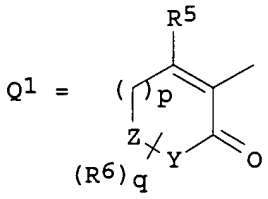
L7 ANSWER 46 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:338507 CAPLUS
DOCUMENT NUMBER: 134:340502
TITLE: Preparation of benzoylcyclohexanediones and benzoylpyrazoles as **herbicides** and **plant** growth regulators.
INVENTOR(S): Seitz, Thomas; Willms, Lothar; Auler, Thomas; Bieringer, Hermann; Thuerwaechter, Felix
PATENT ASSIGNEE(S): Aventis Cropscience G.m.b.H., Germany
SOURCE: PCT Int. Appl., 113 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

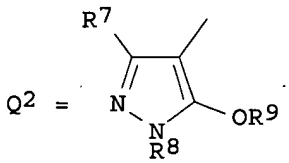
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001032636	A1	20010510	WO 2000-EP10460	20001024
W: AE, AG, AL, AM, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CN, CR, CU, CZ, DM, DZ, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TJ, TM, TR, TT, UA, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
BR 2000015338	A	20020723	BR 2000-15338	20001024
EP 1235816	A1	20020904	EP 2000-974443	20001024
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL				
JP 2003513081	T2	20030408	JP 2001-534787	20001024
US 6448201	B1	20020910	US 2000-705001	20001102

PRIORITY APPLN. INFO.: DE 1999-19953136 A 19991104
WO 2000-EP10460 W 20001024
OTHER SOURCE(S): MARPAT 134:340502
GI



I



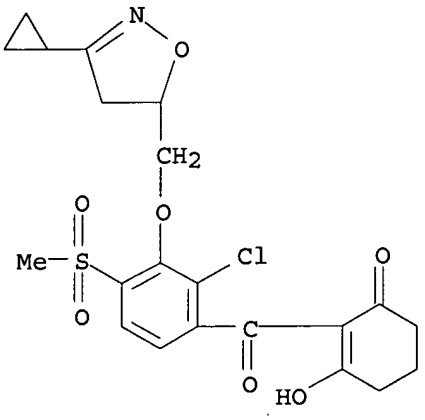


AB Title compds. [I; Q = Q1, Q2; X = OR3a, OCOR3a, OCONHR3a, OSO2R3a, alkyl, alkenyl, alkynyl, Ph, etc.; R1, R2 = H, SH, NO2, halo, cyano, alkyl, alkoxyalkyl, haloalkyl, alkenyl, alkynyl, etc.; R3 = H, OH, halo, SH, amino, cyano, NO2, CHO, alkoxycarbonyl, alkylcarbonyl, etc.; R3a = H, (substituted) alkyl, alkenyl, alkynyl, Ph, phenylalkyl; R4 = [C(R11)2]mAr[C(R11)2]mR12; A = O, S; R5 = OR16, alkylthio, haloalkylthio, alkenylthio, haloalkenylthio, alkynylthio, haloalkynylthio, alkylsulfinyl, haloalkylsulfinyl, etc.; R6 = H, tetrahydropyranyl, tetrahydrothiopyranyl, (substituted) alkyl, cycloalkyl, alkoxy, alkylcarbonyl, alkoxyalkyl, etc.; R7 = H, alkyl, haloalkyl; R8 = alkyl, haloalkyl, (substituted) Ph; R9 = H, alkyl, haloalkyl, alkylcarbonyl, alkoxycarbonyl, haloalkylcarbonyl, alkoxycarbonyl, alkylsulfonyl, haloalkylsulfonyl, (substituted) PhCO, PhCOCH2, PhOCO2, PhSO2, etc.; R11 = H, alkyl, halo; R12 = (substituted) cycloalkyl, cycloalkenyl, aryl, heterocyclyl, heteroaryl, etc.; Y = O, S, NH, CHR6, C(R6)2, alkylimino; Z = bond, O, S, SO, SO2, NH, alkylimino, CHR7, C(R7)2; m, n = 0-2; p = 1, 2; q = 0-4; r = 0, 1], were prepd. Thus, 2-chloro-3-(3-phenylisoxazol-5-yl)methoxy-4-methylsulfonylbenzoic acid (prepn. given), cyclohexane-1,3-dione, N'-(3-dimethylaminopropyl)-N-ethylcarbodiimide hydrochloride, and dimethylaminopyridine were stirred in CH2Cl2 to give 60% enol ether, which was stirred with acetone cyanohydrin, Et3N, and KCN in MeCN to give 55% 2-[2-chloro-3-(3-phenylisoxazol-5-yl)methoxy-4-methylsulfonylbenzoyl]cyclohexan-1,3-dione. Several I at .ltoreq.1 kg/ha postemergent gave .gtoreq.80% control of Sinapis alba and Stellaria media.

IT **338461-72-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoylcyclohexanediones and benzoylpyrazoles as **herbicides** and **plant** growth regulators)

RN 338461-72-6 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-3-[(3-cyclopropyl-4,5-dihydro-5-isoxazolyl)methoxy]-4-(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 11 THERE ARE 11 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 47 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:247119 CAPLUS
DOCUMENT NUMBER: 134:262313
TITLE: Synergistic selective herbicidal compositions containing N-aryltriazoline(thi)ones
INVENTOR(S): Feucht, Dieter; Drewes, Mark-wilhelm; Dahmen, Peter; Krauskopf, Birgit; Kremer, Mathias; Pontzen, Rolf; Wellmann, Arndt; Haas, Wilhelm
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 51 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

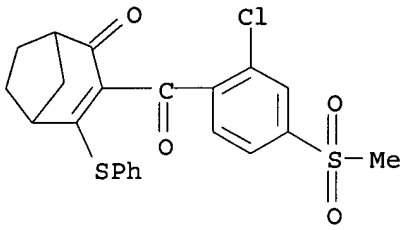
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001022819	A1	20010405	WO 2000-EP9089	20000918
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
DE 19962017	A1	20010405	DE 1999-19962017	19991222
BR 2000014670	A	20020618	BR 2000-14670	20000918
EP 1221848	A1	20020717	EP 2000-964190	20000918
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL				
JP 2003510258	T2	20030318	JP 2001-526045	20000918

PRIORITY APPLN. INFO.: DE 1999-19946855 A 19990930
DE 1999-19962017 A 19991222
WO 2000-EP9089 W 20000918

OTHER SOURCE(S): MARPAT 134:262313

AB The invention relates to binary or ternary herbicidal, synergistic compns. that comprise known N-aryltriazoline(thi)ones and any of a very large no. of known **herbicides**. The compns. are highly selective to **crops** (no examples).

IT **156963-66-5D**, Benzobicyclon, mixts. with N-aryltriazoline(thi)one derivs.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic selective herbicidal compns.)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 16 THERE ARE 16 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

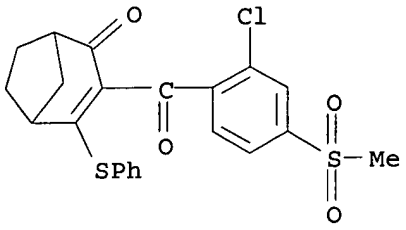
L7 ANSWER 48 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2001:107868 CAPLUS
DOCUMENT NUMBER: 134:174253
TITLE: Synergistic **herbicides** containing Drechslera monoceras and weeds control with them
INVENTOR(S): Mihashi, Tomoko; Eta, Sadafumi; Hirase, Kangetsu; Yamaguchi, Kenichi; Nikumaru, Seiya
PATENT ASSIGNEE(S): Mitsui Chemicals Inc., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2001039811	A2	20010213	JP 1999-213556	19990728

PRIORITY APPLN. INFO.: JP 1999-213556 19990728

AB The compns. contain D. monoceras having herbicidal activity towards Echinochloa sp. and compds. selected from 3-[1-(3,5-dichlorophenyl)-1-methylethyl]-2,3-dihydro-6-methyl-5-phenyl-4H-1,3-oxazin-4-one (oxaziclomefone) (I), 2-[2-(3-chlorophenyl)-2,3-epoxypropyl]-2-ethylindan-1,3-dione (indanofan), 3-[2,4-dichloro-5-(2-propynyloxy)phenyl]-5-(1,1-dimethylethyl)-1,3,4-oxadiazol-2(3H)-one (oxadiargyl), and [3-(2-chloro-4-methylsulfonylbenzoyl)-4-phenylthio]bicyclo-[3,2,1]oct-3-en-2-one. Concomitant application of D. monoceras and I at 0.6 g/are showed 100% control of Echinochloa crus-galli in paddy. Formulation examples are given.

IT **156963-66-5**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** contg. Drechslera monoceras for Echinochloa control in paddy)
RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 49 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:887656 CAPLUS
DOCUMENT NUMBER: 134:25364
TITLE: Polyisoprenyl benzophenone derivatives extracted from Garcinia **plants** as antiinflammatory agents for treatment of dermatitis
INVENTOR(S): Kataoka, Shigehiro; Iwai, Yukihiko; Yamaguchi, Norio; Saito, Minoru
PATENT ASSIGNEE(S): Kikkoman Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000351728	A2	20001219	JP 1999-163402	19990610

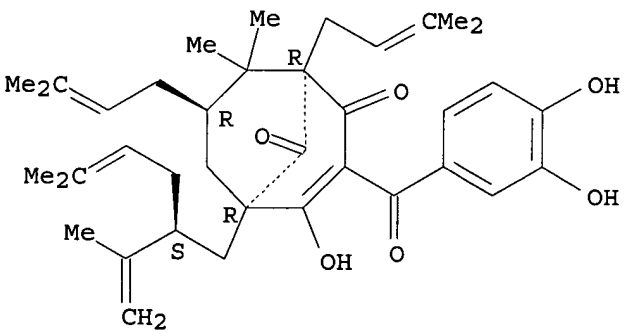
PRIORITY APPLN. INFO.: JP 1999-163402 19990610

AB Polyisoprenyl benzophenone derivs., e.g. garcinol, extd. from Garcinia **plants** by org. solvents, e.g. G. indica, are claimed as antiinflammatory agents for treatment of dermatitis. Formulation examples of powders, syrups, tinctures, and ointments were given.

IT **78824-30-3**, Garcinol
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(polyisoprenyl benzophenone derivs. extd. from Garcinia **plants** as antiinflammatory agents for treatment of dermatitis)

RN 78824-30-3 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L7 ANSWER 50 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:817434 CAPLUS
DOCUMENT NUMBER: 133:360024
TITLE: Selective synergistic **herbicides** containing pyrazolylcarbonitrile derivative
INVENTOR(S): Sugiura, Kenji; Ohtaki, Kentaro
PATENT ASSIGNEE(S): Aglebo Japan K. K., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 18 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000319114	A2	20001121	JP 1999-123115	19990428

PRIORITY APPLN. INFO.: JP 1999-123115 19990428

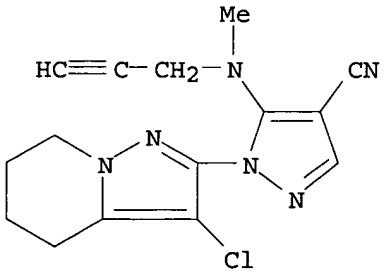
AB The **herbicides** contain 1-[3-chloro-4,5,6,7-tetrahydropyrazolo-(1,5a)-pyridin-2-yl]-5-(methylpropargylamino)-4-pyrazolylcarbonitrile (I) and .gtoreq.1 compds. chosen from etobenzanid (II), dimethametryn, pyriminobac-Me, butamifos, pentoxazone, oxaziclomefone, halosulfuron-Me, SAP, ACN, dithiopyr, and [3-(2-chloro-4-methylsulfonylbenzoyl)-4-phenylthio]bicyclo[3.2.1]oct-3-en-2-one. The **herbicides** control weeds without damage on **crops** (esp., rice). Concomitant application of 50 g I and 700 g II/ha showed 100 and 80% control of Panicum crus-galli and Scirpus juncoides, resp., vs. poor effect, for I or II alone.

IT **307932-10-1**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(selective synergistic **herbicides**)

RN 307932-10-1 CAPLUS
CN 1H-Pyrazole-4-carbonitrile, 1-(3-chloro-4,5,6,7-tetrahydropyrazolo[1,5-a]pyridin-2-yl)-5-(methyl-2-propynylamino)-, mixt. with 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

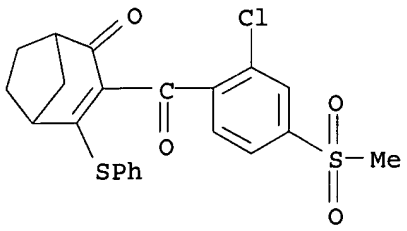
CM 1

CRN 158353-15-2
CMF C15 H15 Cl N6



CM 2

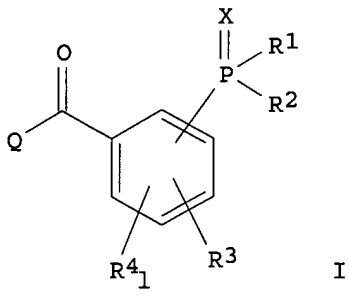
CRN 156963-66-5
CMF C22 H19 Cl O4 S2



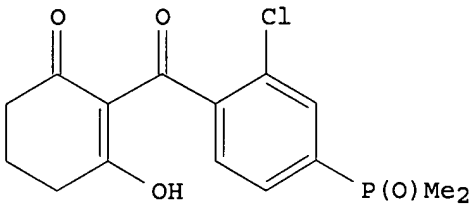
L7 ANSWER 51 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:772644 CAPLUS
DOCUMENT NUMBER: 133:321999
TITLE: Phosphoric benzoyl derivatives and their use as **herbicides**
INVENTOR(S): Langemann, Klaus; Volk, Thorsten; Baumann, Ernst; Von Deyn, Wolfgang; Kudis, Steffen; Mayer, Guido; Misslitz, Ulf; Neidlein, Ulf; Witschel, Matthias; Otten, Martina; Westphalen, Karl-Otto; Walter, Helmut
PATENT ASSIGNEE(S): BASF Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 380 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000064912	A1	20001102	WO 2000-EP3548	20000419
W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
EP 1173449	A1	20020123	EP 2000-922650	20000419
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO				
JP 2002543085	T2	20021217	JP 2000-614263	20000419

PRIORITY APPLN. INFO.: DE 1999-19918914 A 19990427
WO 2000-EP3548 W 20000419
OTHER SOURCE(S): MARPAT 133:321999
GI



I



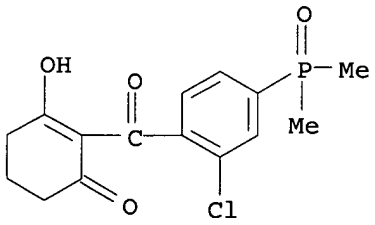
II

AB Phosphorus-contg. benzoyl derivs. I [X = O, S; R1, R2 = H, (un)substituted C1-6 alkyl, (un)substituted C2-6 alkenyl, (un)substituted C2-6 alkynyl, (un)substituted Ph or phenoxy, etc.; R1R2 = (un)substituted O(CH2)mO, or other CH2 chain, etc., m = 2-4; R3 = H, nitro, cyano, halo, (un)substituted alkyl, alkylcarbonyl, alkoxycarbonyl, (un)substituted alkoxy, (un)substituted alkylthio, (un)substituted alkylsulfinyl, (un)substituted alkylsulfonyl, (un)substituted aminosulfonyl, (un)substituted amino, P(X)R1R2, (un)substituted Ph or (un)substituted heterocyclyl; R4 = nitro, cyano, halo, alkyl, alkoxy, alkylthio, alkylsulfinyl or alkylsulfonyl; l = 0-2; Q = (un)substituted 1-hydroxy-3-oxo-cyclohex-1-ene-2-yl, (un)substituted 5-hydroxypyrazol-4-yl, (un)substituted isoxazol-4-yl or (un)substituted 2-cyano-1-oxo-eth-2-yl] and their agriculturally useful salts, useful as **herbicides**, are claimed. A variety of known methods and intermediates for producing I, agents contg. them and the use of I or of the agents contg. them for controlling undesirable **plants** are also claimed. Thus, in an example, the oxocyclohexenyl deriv. II at 0.5 or 0.25 kg/ha showed very good activity against lamb's-quarters (goosefoot), barnyard grass, giant foxtail, green foxtail and black nightshade.

IT **303014-52-0P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of phosphoric benzoyl derivs. as **herbicides**)

RN 303014-52-0 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(dimethylphosphinyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 15 THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 52 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:704285 CAPLUS
DOCUMENT NUMBER: 134:320342
TITLE: Antimitotic and cytotoxic compounds from tropical **plants**
AUTHOR(S): Sevenet, Thierry

09/ 943,037

CORPORATE SOURCE: Institut de Chimie desSubstances Naturelles, Institut de Chimie desSubstances Naturelles, CNRS, Gif-sur-Yvette, 91198, Fr.
SOURCE: Nigerian Journal of Natural Products and Medicine (1999), 3, 9-14
CODEN: NJNPCE; ISSN: 1118-6267
PUBLISHER: Nigerian Society of Pharmacognosy
DOCUMENT TYPE: Journal; General Review
LANGUAGE: English

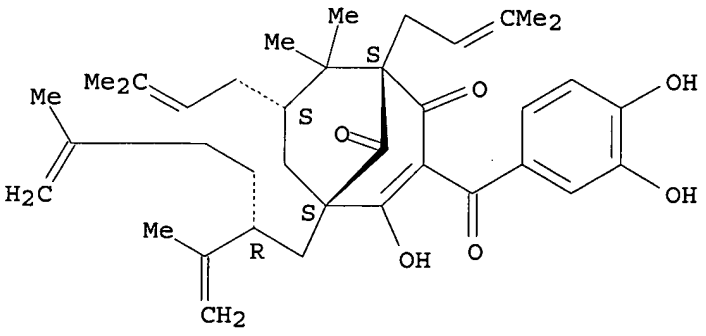
AB A review, with 3 refs. Starting from the discoveries of navelbine and taxotere, two potent analogs of natural antitumor compds., the search of new antitumor drugs has continued at Gif-sur-Yvette, by assocg. classical cytotoxicity assays with other mechanisms involved in the cell replication pathway. The tubulin-microtubules system, an easy and efficient method, is one of the targets used in finding new antimitotic drugs. Through various research programs in tropical countries and in the framework of the long-term cooperation between the University of Malaya and CNRS, a no. of mols. have been shown to possess activity on tubulin. Among them, rhazinilam was isolated from a Malaysian Kopsia, K. singapurensis Ridley, Apocynaceae. A review, with 3 refs. It has specific activity on microtubules. Studies of structure-activity relationships guided by the tubulin-test have led to a better knowledge of the properties of rhazinilam and to the design of analogs. Cytotoxic prenylxanthones have also been isolated from Vietnamese Garcinia, G. nigrolineata (Clausiaceae). Nigrolineatin and its analogs possess anti-oncogene activity on FPTase. Other xanthone derivs. like xanthochymol were isolated from a Malaysian Garcinia, G. pyrifera and were found to possess an activity on tubulin. Structure-activity relationships studies on these series have been done.

IT **52617-32-0**, Xanthochymol
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(antimitotic and cytotoxic compds. from tropical **plants**)

RN 52617-32-0 CAPLUS

CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2R)-5-methyl-2-(1-methylethenyl)-5-hexenyl]-, (1S,5S,7S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 53 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:657992 CAPLUS
DOCUMENT NUMBER: 133:233911
TITLE: Quick-acting herbicidal compositions and their use for pre- and postemergence weed control in rice paddy
INVENTOR(S): Ikeda, Kaoru; Ihara, Hiroshi; Mukoda, Shuji
PATENT ASSIGNEE(S): Rhone-Poulenc Yuka Agro Co., Ltd., Japan

09/ 943,037

SOURCE: Jpn. Kokai Tokkyo Koho, 11 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000256109	A2	20000919	JP 1999-62280	19990309

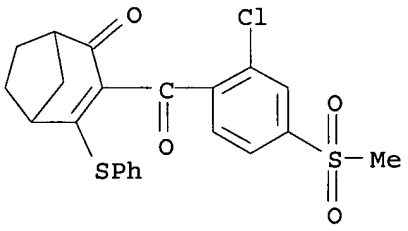
PRIORITY APPLN. INFO.: JP 1999-62280 19990309

AB The compns. contain 1:(0.001-10) (by wt.) leaf application-type non-selective **herbicides** and soil application-type **herbicides** for rice, and are applied to rice paddy before irrigation. A compn. contg. glufosinate and pretilachlor at 500 g/ha and 150 g/ha, resp., showed almost 100% pre- and postemergence herbicidal activity.

IT **156963-66-5D**, SB 500, mixts. contg.
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(quick-acting herbicidal compns. for pre- and postemergence weed control in rice paddy)

RN 156963-66-5 CAPLUS

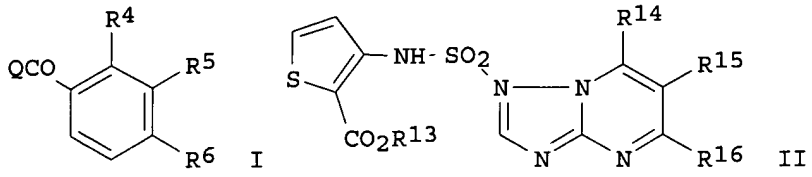
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



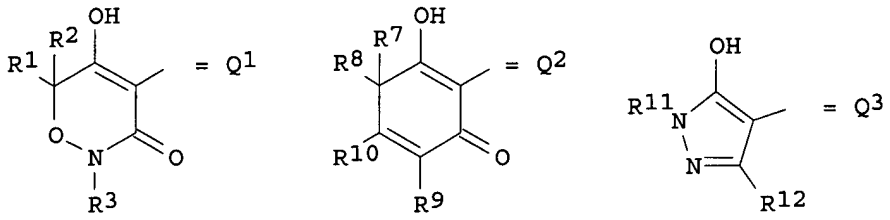
L7 ANSWER 54 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:457412 CAPLUS
DOCUMENT NUMBER: 133:70200
TITLE: Safened herbicidal compositions and preparation of benzoate **herbicides**
INVENTOR(S): Glock, Jutta; Rueegg, Willy
PATENT ASSIGNEE(S): Novartis A.-G., Switz.
SOURCE: Ger. Offen., 36 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19961465	A1	20000706	DE 1999-19961465	19991220

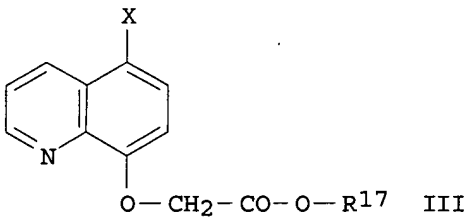
PRIORITY APPLN. INFO.: CH 1998-2520 A 19981221
OTHER SOURCE(S): MARPAT 133:70200
GI



I II



= Q1 = Q2 = Q3



III

AB The title compns. comprise a benzoate **herbicide** I [Q = Q1, Q2, Q3, etc; R1, R2, R7, R8 = H, alkyl, etc; R3, R9,R10 = H, (halo)alkyl or alkoxyalkyl; R4 = (halo)alkyl, alkoxyalkyl, alkenyl, alkynyl, halo, NO2, CO2H, etc.; R5 = H, (halo)alkyl, alkoxy, alkylthio, etc.; R6 = (halo)alkyl, halo, NO2, CN, etc.; R11, R12 = H, alkyl, alkoxycarbonyl, (un)substituted Ph, etc.] and an antidote, such as II [R13 = H, (cyclo)alkyl, alkenyl or alkynyl; R14, R15, R16 .noteq. H], III (X = H or Cl, R17 = H, alkyl, alkoxy, etc.), and other compds. The prepn. of I is given.

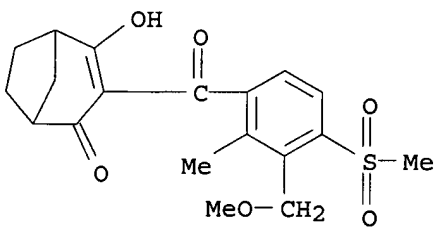
IT **279687-62-6**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(safened herbicidal compn.)

RN 279687-62-6 CAPLUS

CN Acetic acid, [(5-chloro-8-quinolinyl)oxy]-, 1-methylhexyl ester, mixt. with 4-hydroxy-3-[3-(methoxymethyl)-2-methyl-4-(methylsulfonyl)benzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

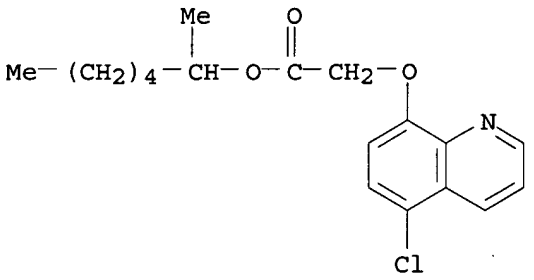
CM 1

CRN 279214-98-1
CMF C19 H22 O6 S



CM 2

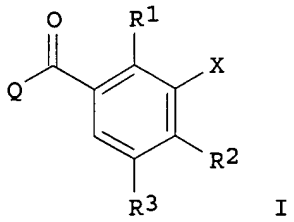
CRN 99607-70-2
CMF C18 H22 Cl N O3



L7 ANSWER 55 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:441769 CAPLUS
DOCUMENT NUMBER: 133:73851
TITLE: Preparation of novel herbicidally active benzoyl derivatives
INVENTOR(S): Schaetzer, Juergen; De Mesmaeker, Alain; Lee, Shy-Fuh
PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis-Erfindungen Verwaltungsgesellschaft m.b.H.
SOURCE: PCT Int. Appl., 53 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000037437	A1	20000629	WO 1999-EP10128	19991220
W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
BR 9916396	A	20010911	BR 1999-16396	19991220
EP 1140811	A1	20011010	EP 1999-963584	19991220
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO				
US 2002165096	A1	20021107	US 2001-886896	20010621

PRIORITY APPLN. INFO.: CH 1998-2521 A 19981221
WO 1999-EP10128 W 19991220
OTHER SOURCE(S): MARPAT 133:73851
GI



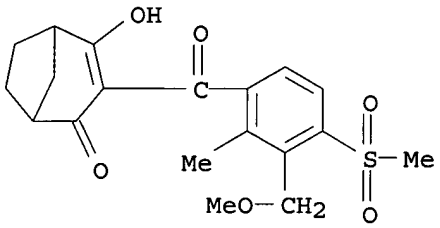
I

AB The title compds. [I; X = CH2OMe, CH2OEt, CH2OH, etc.; R1, R2 = halo, CN, NO2, etc.; R3 = H, alkyl, halo; Q = 5,6-dihydro-5-hydroxy-3-oxo-2,6,6-trimethyl-2H-[1,2]oxazin-4-yl, 4-hydroxy-2-oxo-bicyclo[3.2.1]oct-3-en-3-yl, etc.] which are eminently suitable for use as **herbicides**, were prepd. E.g., a 2-step synthesis of I [X = CH2OMe; R1 = Me; R2 = SO2Me; R3 = H; Q = 5,6-dihydro-5-hydroxy-3-oxo-2,6,6-trimethyl-2H-[1,2]oxazin-4-yl] which showed good herbicidal action against Setaria and Cyperus in pre-emergent and post-emergent action tests at 2000 g AS/ha, was given.

IT **279214-98-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of novel herbicidally active benzoyl derivs.)

RN 279214-98-1 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 4-hydroxy-3-[3-(methoxymethyl)-2-methyl-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 56 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2000:349132 CAPLUS
DOCUMENT NUMBER: 132:330878
TITLE: Combinations of **herbicides** and safeners.
INVENTOR(S): Ziemer, Frank; Willms, Lothar; Bieringer, Hermann; Hacker, Erwin
PATENT ASSIGNEE(S): Aventis Cropscience G.m.b.H., Germany
SOURCE: Ger. Offen., 28 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19853827	A1	20000525	DE 1998-19853827	19981121
WO 2000030447	A1	20000602	WO 1999-EP8470	19991105

W: AE, AL, AM, AU, AZ, BA, BB, BG, BR, BY, CA, CN, CR, CU, CZ, DM,

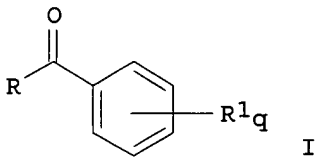
EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK,
LR, LT, LV, MA, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI,
SK, TJ, TM, TR, TT, UA, US, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ,
MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE,
DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF,
CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

BR 9915516	A	20010717	BR 1999-15516	19991105
EP 1130965	A1	20010912	EP 1999-972493	19991105
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO				
JP 2002530301	T2	20020917	JP 2000-583345	19991105
BG 105474	A	20011130	BG 2001-105474	20010425

PRIORITY APPLN. INFO.: DE 1998-19853827 A 19981121
WO 1999-EP8470 W 19991105

OTHER SOURCE(S): MARPAT 132:330878

GI



I

AB Safened herbicidal compns. are described contg. at least one **herbicide** ad one antidote. The **herbicide** is a benzoyl deriv. I [R = isoxazol-4-yl, pyrazol-4-yl, cyclohexan-1,3-dion-2-yl or 3-oxopropionitril-2-yl; R1 = (un)substituted nitro, amino, halo, etc., q = 0, 1-4]. The antidote is e.g. 2,4-D, cyometrinil, dicamba, dymron, fenclorim, flurazole, fluxofenim, lactidichlor, MCPA, mecoprop, MG-191, oxabetrinil, Me diphenylmethoxyacetate, 1-[4-(N-2-methoxybenzoylsulfamoyl)phenyl]-3-methylurea, 1,8-naphthalic anhydride, 1-[4-(N-2-methoxybenzoylsulfamoyl)phenyl]-3,3-dimethylurea, 1-[4-(4,5-dimethylbenzoylsulfamoyl)phenyl]-3-methylurea, 1-[4-(N-naphthoylsulfamoyl)phenyl]-3,3-dimethylurea, (4-chlorphenoxy)acetic acid, 4-(2,4-dichlorophenoxy)butyric acid, 4-(4-chloro-o-tolyloxy)butyric acid, 4-(4-chlorophenoxy)butyric acid, free, esterified, or salts, N-acylsulfonamides, N-acylsulfamoylbenzoic acid amides as well as substituted 1-phenylpyrazoline, 1-phenylpyrazole, 1-phenyltriazole, 5-phenylisoxazoline, 5-phenylmethylisoxazolin-3-carboxylic acid and 2-(8-quinolinyloxy)acetic acid derivs.

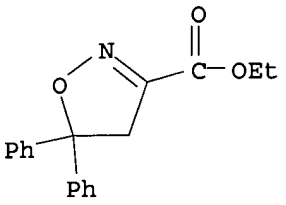
IT **268548-23-8**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(safened herbicidal compn.)

RN 268548-23-8 CAPLUS

CN 3-Isoxazolecarboxylic acid, 4,5-dihydro-5,5-diphenyl-, ethyl ester, mixt. with 2-[2-chloro-4-(methylsulfonyl)benzoyl]-3-hydroxy-2-cyclohexen-1-one (9CI) (CA INDEX NAME)

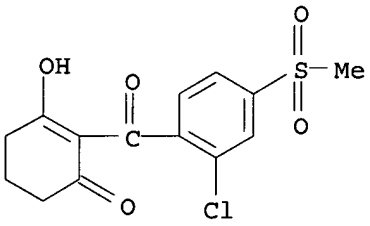
CM 1

CRN 163520-33-0
CMF C18 H17 N O3



CM 2

CRN 129233-47-2
CMF C14 H13 Cl O5 S



L7 ANSWER 57 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:238461 CAPLUS
DOCUMENT NUMBER: 132:264966
TITLE: Preparation of benzoylcyclohexandiones as **herbicides** and **plant** growth regulators
INVENTOR(S): Van Almsick, Andreas; Willms, Lothar; Auler, Thomas; Bieringer, Hermann; Rosinger, Christopher
PATENT ASSIGNEE(S): Hoechst Schering Agrevo G.m.b.H., Germany
SOURCE: Ger. Offen., 68 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19846792	A1	20000413	DE 1998-19846792	19981010
CA 2346796	AA	20000420	CA 1999-2346796	19990909
WO 2000021924	A1	20000420	WO 1999-EP6627	19990909
W: AE, AL, AM, AU, AZ, BA, BB, BG, BR, BY, CA, CN, CR, CU, CZ, DM, EE, GD, GE, HR, HU, ID, IL, IN, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TJ, TM, TR, TT, UA, UZ, VN, YU, ZA, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
AU 9958616	A1	20000501	AU 1999-58616	19990909
EP 1117639	A1	20010725	EP 1999-946146	19990909
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI, RO				
BR 9914390	A	20010807	BR 1999-14390	19990909
JP 2002527418	T2	20020827	JP 2000-575833	19990909

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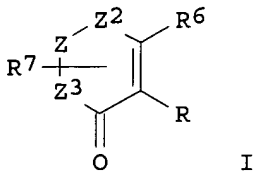
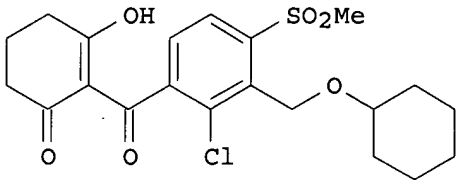
US 6376429 B1 20020423 US 1999-414455 19991007
PRIORITY APPLN. INFO.: DE 1998-19846792 A 19981010
WO 1999-EP6627 W 19990909
OTHER SOURCE(S): MARPAT 132:264966
GI



I

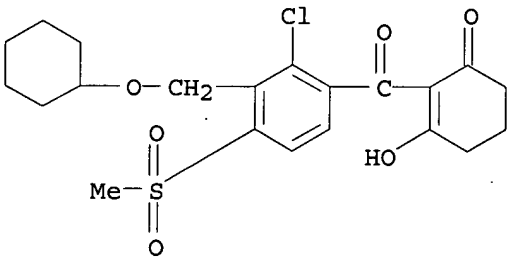


II

AB Title compds. [I; R = COZ4Z1R1; R1 = (heteroatom-contg.) hydrocarbyl; R6 = OH, halo, cyano, alkoxy, alkylthio, etc.; R7 = H or 1-4 of alkyl, alkoxy, tetrahydropyranyl, etc.; Z = bond, O, SO0-2, (alkyl)imino, CH2, etc.; Z1 = (un)substituted alkylene; Z2 = CH2 or CH2CH2; Z3 = O, S, (alkyl)imino, CH2, etc.; Z4 = (un)substituted 1,3-phenylene] were prepd. Thus, 2-chloro-3-cyclohexyloxymethyl-4-methylsulfonylbenzoic acid (prepn. given) was esterified by 1,3-cyclohexanedione and the product rearranged to title compd. II. Data for biol. activity of I were given.

IT **263401-00-9P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoylcyclohexandiones as **herbicides** and **plant** growth regulators)

RN 263401-00-9 CAPLUS
CN 2-Cyclohexen-1-one, 2-[2-chloro-3-[(cyclohexyloxy)methyl]-4-(methylsulfonyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 58 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:151445 CAPLUS
DOCUMENT NUMBER: 132:189692
TITLE: Polyisoprenylated benzophenones derived from Garcinia **plants** as hyaluronidase inhibitors
INVENTOR(S): Yamaguchi, Norio; Ariga, Toshiaki
PATENT ASSIGNEE(S): Kikkoman Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000072665	A2	20000307	JP 1998-245945	19980831

PRIORITY APPLN. INFO.: JP 1998-245945 19980831

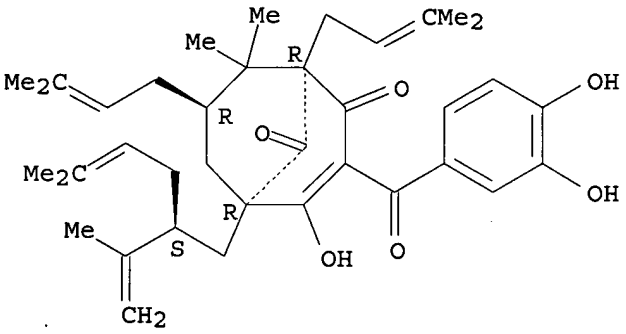
AB Polyisoprenylated benzophenones derived from Garcinia **plants**, including garcinol and isogarcinol, are claimed as hyaluronidase inhibitors for prevention of skin aging and as antiinflammatory and antitumor agents. Formulation examples of topical prepn. and powders were given.

IT **78824-30-3P**, Garcinol
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PUR (Purification or recovery); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(polyisoprenylated benzophenones derived from Garcinia **plants** as hyaluronidase inhibitors)

RN 78824-30-3 CAPLUS

CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L7 ANSWER 59 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2000:106874 CAPLUS

DOCUMENT NUMBER: 132:132344

TITLE: Benzophenone derivatives from Garcinia **plants** as lipase inhibitor, anti-obesity agents, and hypolipidemics

INVENTOR(S): Yamaguchi, Norio; Ariga, Toshiaki

PATENT ASSIGNEE(S): Kikkoman Corp., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000044468	A2	20000215	JP 1998-214039	19980729

PRIORITY APPLN. INFO.: JP 1998-214039 19980729

AB Benzophenone derivs. from Garcinia **plants**, including garcinol and polyisoprenyl benzophenone derivs., are claimed as lipase inhibitor, anti-obesity agents, and hypolipidemics. Garcinol was isolated from G. indica fruit skin, and its lipase-inhibiting effect was tested. Formulation examples of syrups, powders, and soft capsules as health foods were given.

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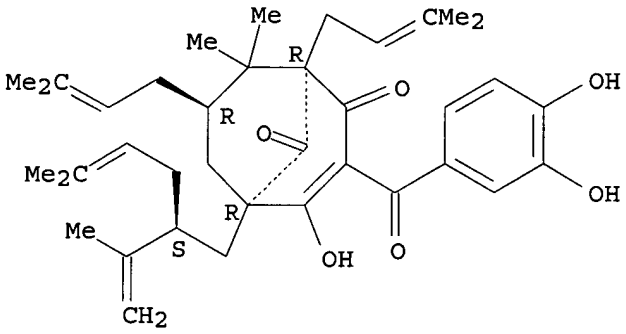
IT **78824-30-3P**, Garcinol
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PUR (Purification or recovery); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(benzophenone derivs. from Garcinia **plants** as lipase inhibitor, anti-obesity agents, and hypolipidemics)
RN 78824-30-3 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



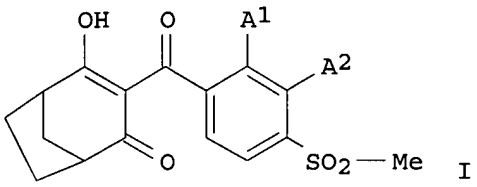
L7 ANSWER 60 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:14942 CAPLUS
DOCUMENT NUMBER: 132:46270
TITLE: Synergistic herbicidal compositions.
INVENTOR(S): Ruegg, Willy
PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis-Erfindungen Verwaltungsgesellschaft m.b.H.
SOURCE: PCT Int. Appl., 61 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000000029	A1	20000106	WO 1999-EP4373	19990624
W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
AU 9949006	A1	20000117	AU 1999-49006	19990624
BR 9911587	A	20010320	BR 1999-11587	19990624
EP 1089624	A1	20010411	EP 1999-932719	19990624
R: AT, BE, CH, DE, ES, FR, IT, LI, LU, NL				
US 2001004628	A1	20010621	US 2000-747914	20001220
US 6413907	B2	20020702		

PRIORITY APPLN. INFO.: CH 1998-1372 A 19980626
WO 1999-EP4373 W 19990624
OTHER SOURCE(S): MARPAT 132:46270

09/ 943,037

GI



I

AB The title compn. comprises a mixt. of I (A1 = nitro and A2 = H; or A1 = Me and A2 = MeO) or their salts, and one or more of a large no. of known **herbicides**. The compns. may also contain a safener.

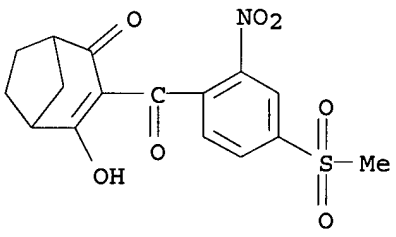
IT **252935-69-6**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(synergistic herbicidal compn.)

RN 252935-69-6 CAPLUS

CN 1H-Pyrazole-4-carboxylic acid, 3-chloro-5-[[[[(4,6-dimethoxy-2-pyrimidinyl)amino]carbonyl]amino]sulfonyl]-1-methyl-, mixt. with 4-hydroxy-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

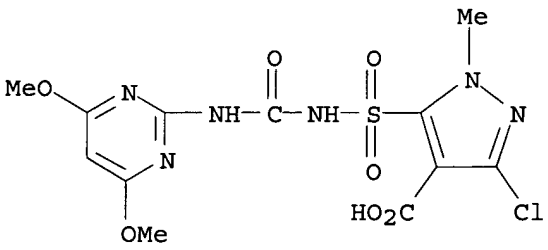
CM 1

CRN 137014-61-0
CMF C16 H15 N O7 S



CM 2

CRN 135397-30-7
CMF C12 H13 Cl N6 O7 S



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

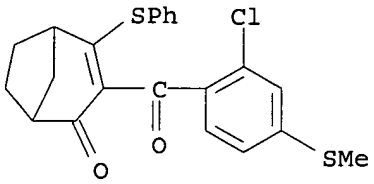
L7 ANSWER 61 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:802760 CAPLUS
DOCUMENT NUMBER: 132:32180
TITLE: Stable aqueous suspensions of paddy **herbicide** containing ligninsulfonic acid salts
INVENTOR(S): Suzuki, Kazutoshi
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 4 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 11349412	A2	19991221	JP 1998-193531	19980605

PRIORITY APPLN. INFO.: JP 1998-193531 19980605

AB The suspensions of [3-(2-chloro-4-methylsulfenylbenzoyl)-4-phenylthio]bicyclo[3.2.1]oct-3-en-2-one (I), which shows good storage stability, contain ligninsulfonic acid salts dispersed therein. A flowable was prepd. from I 6, San-X P 252 (ligninsulfonate) 3, propylene glycol 10, Antifoam E 20 (silicone emulsion) 0.2, Kunipia F (montmorillonite) 1.5, Proxel GXL (**fungicide**) 0.1, and H2O to 100 parts. The flowable was exposed to 24-h-cycle change between -5.degree. and 50.degree. for 3 wk to show no change in the av. particle size.

IT **252337-50-1**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(stable flowables of [(chloromethylsulfenylbenzoyl)(phenylthio]bicycloo ctenone as paddy **herbicide** contg. ligninsulfonic acid salts)
RN 252337-50-1 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylthio)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)

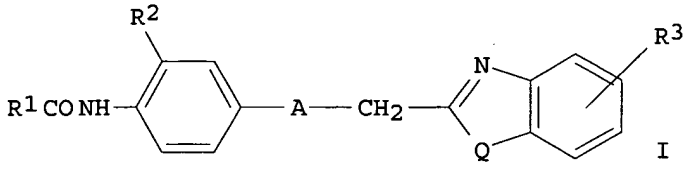


L7 ANSWER 62 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:332962 CAPLUS
DOCUMENT NUMBER: 131:28907
TITLE: Synergistic **herbicides** containing anilines for rice
INVENTOR(S): Kadotani, Junji; Isarai, Kiyoshi; Takemura, Kayoko; Ohara, Shigeru; Sato, Kazuo; Sano, Hiroki
PATENT ASSIGNEE(S): Sankyo Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 31 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE

JP 11139911	A2	19990525	JP 1998-252601	19980907

PRIORITY APPLN. INFO.: JP 1997-242969 19970908
OTHER SOURCE(S): MARPAT 131:28907
GI

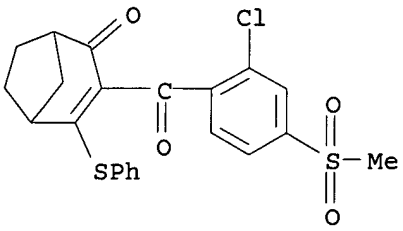


AB Broad-spectrum **herbicides** that are effective even against established weeds but safe for rice contain anilines (I, R1 = Me or MeO; R2 = H or Me; R3 = H, 5-F, 6-F or 6-MeO; A = O or S; Q = O or S) and .gtoreq.1 herbicidal component selected from sulfonylureas, pretilachlor, butachlor, benthiocarb, esprocarb, molinate, pyributicarb, anilofos, mefenacet, etc. Thus, I (R1 = MeO, R2 = Me, R3 = H, A = O, Q = S)-pyrazosulfuron-Et mixt. (45 + 2 g/10 are) gave 96-100% control of Echinochloa, broad-leaved weeds, Scirpus juncoides, Sagittaria pygmaea, Cyperus serotinus, and Eleocharis kuroguwai with no damage to rice **plants**. Formulation examples are given.

IT **156963-66-5D**, SB 500, mixts. with anilines
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** for rice)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 63 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER:	1999:205525 CAPLUS
DOCUMENT NUMBER:	130:263540
TITLE:	Synergistic herbicidal composition containing benzoyl bicyclooctenone and pyrazole sulfonylurea for paddy fields
INVENTOR(S):	Yamada, Yuji
PATENT ASSIGNEE(S):	SDS Biotech Corp., Japan
SOURCE:	Jpn. Kokai Tokkyo Koho, 8 pp. CODEN: JKXXAF
DOCUMENT TYPE:	Patent
LANGUAGE:	Japanese
FAMILY ACC. NUM. COUNT:	1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE

JP 11079910	A2	19990323	JP 1997-239418	19970904
PRIORITY APPLN. INFO.:			JP 1997-239418	19970904

AB A herbicidal compn. contg. [3-(2-chloro-4-methylsulfonylbenzoyl)-4-phenylthio]bicyclo[3.2.1]oct-3-en-2-one (I) and Me 3-chloro-5-(4,6-dimethoxypyrimidin-2-ylcarbamoylsulfamoyl)-1-methylpyrazole-4-carboxylate (II) provides long-term control of important dicotyledonous and monocotyledonous weeds in paddy fields with a small quantity of active components. Thus, a wettable powder was obtained by uniformly mixing and pulverizing I 20.0, II 3.0, Na alkylbenzenesulfonate 2.0, naphthalenesulfonic acid formalin condensate Na salt 3.0, white carbon 3.0, and clay 69.0 parts. Pot and field expts. showed that I and II acted synergistically to control several weeds with no damage to rice.

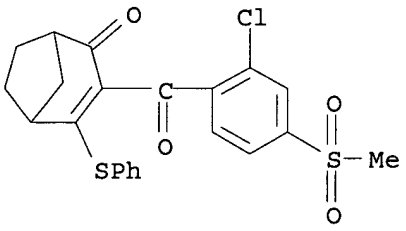
IT **222054-81-1**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicide** for rice paddies)

RN 222054-81-1 CAPLUS

CN 1H-Pyrazole-4-carboxylic acid, 3-chloro-5-[[[[(4,6-dimethoxy-2-pyrimidinyl)amino]carbonyl]amino]sulfonyl]-1-methyl-, methyl ester, mixt. with 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

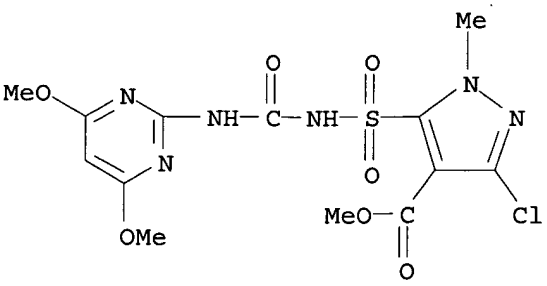
CM 1

CRN 156963-66-5
CMF C22 H19 Cl O4 S2



CM 2

CRN 100784-20-1
CMF C13 H15 Cl N6 O7 S



L7 ANSWER 64 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:118481 CAPLUS
DOCUMENT NUMBER: 130:249517

09/ 943,037

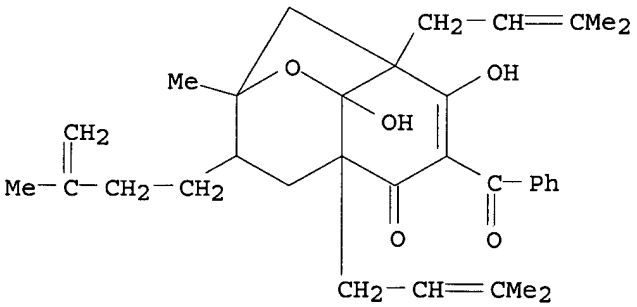
TITLE: Prenylated benzophenone derivatives from Caribbean Clusia species (Guttiferae). Plukenetiones B-G and xerophenone A
AUTHOR(S): Henry, Geneive E.; Jacobs, Helen; Carrington, C. M. Sean; McLean, Stewart; Reynolds, William F.
CORPORATE SOURCE: Department of Chemistry, University of the West Indies, Kingston, 7, Jamaica
SOURCE: Tetrahedron (1999), 55(6), 1581-1596
CODEN: TETRAB; ISSN: 0040-4020
PUBLISHER: Elsevier Science Ltd.
DOCUMENT TYPE: Journal
LANGUAGE: English
GI

* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB Six new prenylated benzophenone derivs. plukenetiones B-G, I-VI, resp., have been isolated from the fruits of the Barbadian **plant** Clusia plukenetii. These structures were elucidated by the use of 2D NMR spectroscopic methods. The regiochem. of xerophenone A (VII) from Clusia portlandiana has been revised.

IT **165966-99-4P**
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); PRP (Properties); PUR (Purification or recovery); BIOL (Biological study); OCCU (Occurrence); PREP (Preparation)
(isolation of prenylated benzophenone derivs. from Clusia plukenetii and regiochem. revision of xerophenone A)

RN 165966-99-4 CAPLUS
CN 2,8-Methano-5H-1-benzopyran-5-one, 6-benzoyl-2,3,4,4a,8,8a-hexahydro-7,8a-dihydroxy-2-methyl-4a,8-bis(3-methyl-2-butenyl)-3-(3-methyl-3-butenyl)-, (2R,3R,4aR,8S,8aS)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 65 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:84063 CAPLUS
DOCUMENT NUMBER: 130:139347
TITLE: Preparation of 2-[4-(1,2,4-triazol-1-yl)benzoyl]cyclohexane-1,3-dione derivatives as **herbicides**
INVENTOR(S): Araki, Kouichi; Brett, Takako; Go, Atsushi; Ito, Masahito; Mukaida, Hideshi; Oe, Yukiko; Domom, Kei
PATENT ASSIGNEE(S): Rhobe-Poulenc Agriculture Limited., UK
SOURCE: PCT Int. Appl., 57 pp.
CODEN: PIXXD2

09/ 943,037

DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9903845	A1	19990128	WO 1998-EP4951	19980715
W: AL, AM, AT, AU, AZ, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, GM, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
GB 2327418	A1	19990127	GB 1997-15162	19970718
AU 9893399	A1	19990210	AU 1998-93399	19980715
ZA 9806381	A	19990223	ZA 1998-6381	19980717
US 5977376	A	19991102	US 1998-118367	19980717
US 6048984	A	20000411	US 1999-377244	19990819

PRIORITY APPLN. INFO.:	GB 1997-15162	A	19970718
	US 1997-66934P	P	19971117
	WO 1998-EP4951	W	19980715
	US 1998-118367	A3	19980717

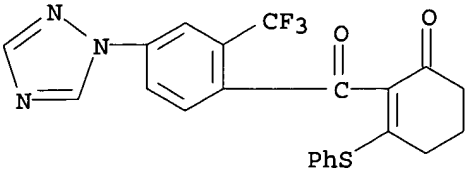
OTHER SOURCE(S): MARPAT 130:139347
GI

* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB The title compds. [I; R1 = II-V or a corresponding VI-VII in which the position of the carbonyl group and the group Q are reversed and the double bond in the ring is attached to the carbon atom attached to the group Q; R2 = halo, lower alkyl, etc.; R3 = 5-membered heteroarom. ring of formula VIII (wherein D, E, G and J = CR19 or N; or two adjacent groups may form a Ph or a 5-7 membered heteroarom. ring which is fused to the first ring); z = 1-2; n = 0-3; Q = OH, lower alkoxy, etc.], useful as **herbicides**, were prepd. Thus, treatment of 3-[4-(1,2,4-triazol-1-yl)-2-trifluoromethylbenzyloxy]cyclohex-2-en-1-one (prepn. given) with triethylamine and acetone cyanohydrin in acetonitrile afforded IX which showed at least 90% redn. in growth of one or more of the weed species such as Echinochloa oryzicola, Monochoria vaginalis, Lindernia procumbens and Scirpus juncoides at 250 g/ha when applied pre- or post-emergence.

IT **220141-07-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 2-[4-(1,2,4-triazol-1-yl)benzoyl]cyclohexane-1,3-dione derivs. as **herbicides**)

RN 220141-07-1 CAPLUS
CN 2-Cyclohexen-1-one, 3-(phenylthio)-2-[4-(1H-1,2,4-triazol-1-yl)-2-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

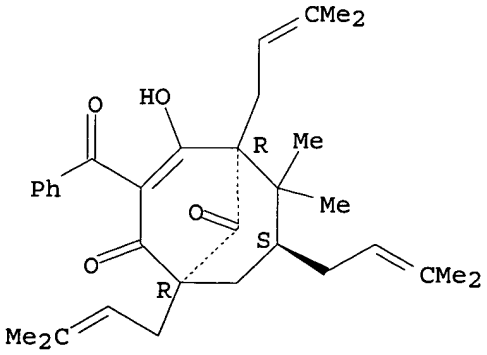
L7 ANSWER 66 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:73243 CAPLUS
DOCUMENT NUMBER: 130:276265
TITLE: Biological Activities of 7-Epiclusianone
AUTHOR(S): Alves, Tania Maria de Almeida; Alves, Rosana de Oliveira; Romanha, Alvaro Jose; Dos Santos, Marcelo Henrique; Nagem, Tanus Jorge; Zani, Carlos Leomar
CORPORATE SOURCE: Centro de Pesquisas Rene Rachou, FIOCRUZ, Belo Horizonte, 30190-002, Brazil
SOURCE: Journal of Natural Products (1999), 62(2), 369-371
CODEN: JNPRDF; ISSN: 0163-3864
PUBLISHER: American Chemical Society
DOCUMENT TYPE: Journal
LANGUAGE: English

AB 7-Epiclusianone, isolated from Rheedia gardneriana, was tested in several biol. assays. It was active in vitro against trypomastigotes of Trypanosoma cruzi but inactive in vivo in exptl. infected mice. It was also active against Artemia salina, but inactive against the fungus Cladosporium sphaerospermum and the snail Biomphalaria glabrata.

IT **219724-61-5P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PUR (Purification or recovery); BIOL (Biological study); PREP (Preparation)
(biol. activities of 7-epiclusianone from Rheedia gardneriana)

RN 219724-61-5 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-benzoyl-4-hydroxy-6,6-dimethyl-1,5,7-tris(3-methyl-2-butenyl)-, (1R,5R,7S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 67 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:795405 CAPLUS
DOCUMENT NUMBER: 130:106468

09/ 943,037

TITLE: Aqueous suspension **herbicide** compositions and control of weeds in paddy field using them
INVENTOR(S): Yasui, Kazuomi; Goto, Toshio; Ito, Seiji; Isono, Kunihiro; Ogawa, Yoshikazu
PATENT ASSIGNEE(S): Nippon Bayer Agrochem K. K., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 11 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

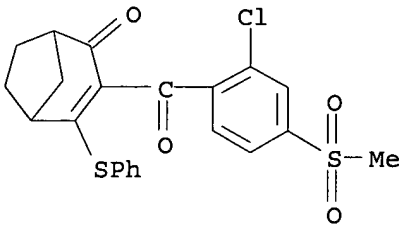
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 10330202	A2	19981215	JP 1997-156033	19970530

PRIORITY APPLN. INFO.: JP 1997-156033 19970530

AB The compns. contain 0.5-60 wt.% .gtoreq.1 slightly water-sol. or water-insol. **herbicides** having medium particle size 0.5-10 .mu.m, 30-97 wt.% H2O, and surfactants to keep the compns. in the suspended state, and show viscosity 90-500 mPa.cntdot.s at 25.degree.. Weeds in paddy field are controlled by applying the compns. just at the time when rice seedlings are transplanted. 1-(2-Chlorophenyl)-4-(N-cyclohexyl-N-ethylcarbamoyl)-5(4H)-tetrazolinone (4 parts) and 0.15 part xanthane gum were suspended in a mixt. of ethylene glycol 10, Newkalgen FS 21 (a mixt. of polyoxyalkylene alkylphenyl ether, Na dioctylsulfosuccinate, and isopropanol) 3, Preventol D2, SAG 10 (silicone oil emulsion) 0.5, and H2O 82.25 parts to give an aq. suspension having medium particle size 2.2 .mu.m and viscosity 145 mPa.cntdot.s at 25.degree.. The suspension was uniformly dispersed in paddy water and showed excellent herbicidal activity without damage to rice.

IT **156963-66-5**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(aq. suspension **herbicide** compns. having controlled medium particle size and viscosity for paddy field)

RN 156963-66-5 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 68 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:789241 CAPLUS
DOCUMENT NUMBER: 130:62400
TITLE: Herbicidal compositions
INVENTOR(S): Nevill, David J.
PATENT ASSIGNEE(S): Novartis A.-G., Switz.
SOURCE: Ger. Offen., 244 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

09/ 943,037

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19834629	A1	19981203	DE 1998-19834629	19980731

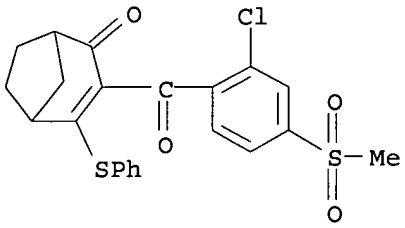
PRIORITY APPLN. INFO.: DE 1998-19834629 19980731

AB The herbicidal compns. are mixts. of a **herbicide** of group I (pretilachlor, cinosulfuron, triasulfuron, etc.) with one or more **herbicides** of group II (bensulfuron, imazosulfuron, etc.).

IT **156963-66-5D**, mixts. contg.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(herbicidal compns.)

RN 156963-66-5 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 69 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1998:789240 CAPLUS

DOCUMENT NUMBER: 130:48703

TITLE: Selective herbicidal compositions

INVENTOR(S): Nevill, David J.

PATENT ASSIGNEE(S): Novartis A.-G., Switz.

SOURCE: Ger. Offen., 394 pp.
CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 19834627	A1	19981203	DE 1998-19834627	19980731

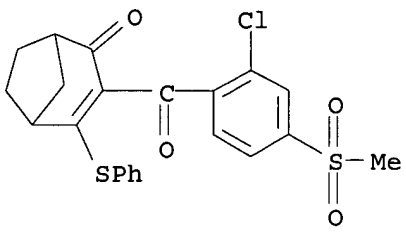
PRIORITY APPLN. INFO.: DE 1998-19834627 19980731

AB The title compns. are made of mixts. of group I and group II **herbicides**. Group I comprises pretilachlor, cinosulfuron, triasulfuron, etc. Group II comprises bensulfuron, imazasulfuron, pyrazosulfuron, etc.

IT **156963-66-5D**, mixts. contg.
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(selective herbicidal compns.)

RN 156963-66-5 CAPLUS

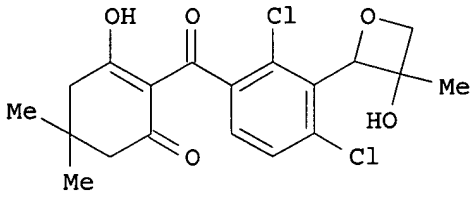
CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 70 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:745047 CAPLUS
DOCUMENT NUMBER: 130:3761
TITLE: Preparation of 2-(oxetanylbenzoyl)cyclohexane-1,3-diones as **herbicides**
INVENTOR(S): Engel, Stefan; Baumann, Ernst; Von Deyn, Wolfgang; Hill, Regina Luise; Kardorff, Uwe; Mayer, Guido; Otten, Martina; Rheinheimer, Joachim; Wagner, Oliver; Witschel, Matthias; Misslitz, Ulf; Walter, Helmut; Westphalen, Karl-otto
PATENT ASSIGNEE(S): Basf A.-G., Germany; et al.
SOURCE: PCT Int. Appl., 134 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9850377	A1	19981112	WO 1998-EP2448	19980424
W: AL, AU, BG, BR, BY, CA, CN, CZ, GE, HU, ID, IL, JP, KR, KZ, LT, LV, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TR, UA, US, UZ, VN, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
CN 1194641	A	19980930	CN 1996-196604	19960829
CN 1100052	B	20030129		
AU 9875290	A1	19981127	AU 1998-75290	19980424
AU 748974	B2	20020613		
EP 983255	A1	20000308	EP 1998-922776	19980424
EP 983255	B1	20030129		
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT				
BR 9808735	A	20000711	BR 1998-8735	19980424
NZ 501495	A	20010831	NZ 1998-501495	19980424
JP 2001525799	T2	20011211	JP 1998-547679	19980424
AT 231848	E	20030215	AT 1998-922776	19980424
ZA 9803796	A	19991108	ZA 1998-3796	19980506
MX 9909777	A	20000331	MX 1999-9777	19991025
US 6140273	A	20001031	US 1999-423076	19991102

PRIORITY APPLN. INFO.: DE 1997-19726711 A 19970507
WO 1998-EP2448 A 19980424
OTHER SOURCE(S): MARPAT 130:3761
GI



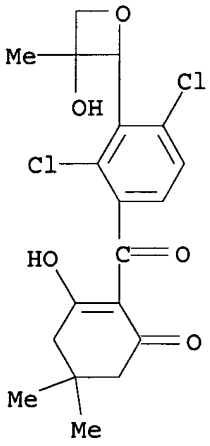
II

AB R1ZCOR [I; R = tautomeric (un)substituted 2,6-dioxocyclohexyl; R1 = (un)substituted oxiranyl or -oxetanly; Z = (un)substituted phenylene-1,3-diyl] were prepd. Thus, Me 2,4-dichloro-3-formylbenzoate was cyclocondensed with CH2:C(OSiMe3)Me and the deprotected and sapond. product used to acylate 5,5-dimethyl-1,3-cyclohexanedione to give title compd. II. Data for biol. activity of I were given.

IT **215662-24-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 2-(oxetanylbenzoyl)cyclohexane-1,3-diones as **herbicides**)

RN 215662-24-1 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2,4-dichloro-3-(3-hydroxy-3-methyl-2-oxetanyl)benzoyl]-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 71 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1998:745011 CAPLUS

DOCUMENT NUMBER: 130:3687

TITLE: Preparation of 2-(3-alkenylbenzoyl)cyclohexane-1,3-diones as **herbicides**

INVENTOR(S): Baumann, Ernst; Von Deyn, Wolfgang; Engel, Stefan; Hill, Regina Luise; Kardorff, Uwe; Mayer, Guido; Otten, Martina; Rack, Michael; Rheinheimer, Joachim; Witschel, Matthias; Westphalen, Karl-otto; Misslitz, Ulf; Walter, Helmut

PATENT ASSIGNEE(S): Basf A.-G., Germany; et al.

SOURCE: PCT Int. Appl., 68 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

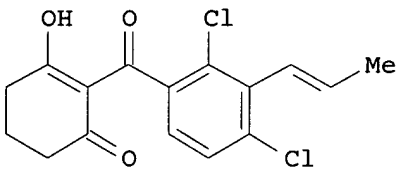
09/ 943,037

LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9850337	A1	19981112	WO 1998-EP2447	19980424
W: AL, AU, BG, BR, BY, CA, CN, CZ, GE, HU, ID, IL, JP, KR, KZ, LT, LV, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TR, UA, US, UZ, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
AU 9876482	A1	19981127	AU 1998-76482	19980424
AU 749016	B2	20020613		
EP 984914	A1	20000315	EP 1998-924202	19980424
EP 984914	B1	20030319		
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT				
BR 9809239	A	20000627	BR 1998-9239	19980424
NZ 337707	A	20010629	NZ 1998-337707	19980424
JP 2001525798	T2	20011211	JP 1998-547678	19980424
ZA 9803794	A	19991108	ZA 1998-3794	19980506
US 6372693	B1	20020416	US 1999-423117	19991102

PRIORITY APPLN. INFO.: DE 1997-19719380 A 19970507
WO 1998-EP2447 W 19980424

OTHER SOURCE(S): MARPAT 130:3687
GI



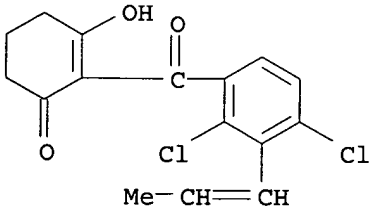
I

AB RCOZCR3:CR4R5 [I; R = (un)substituted tautomeric 2,6-dioxocyclohexyl; R3 = H, halo, (halo)alkyl; alkoxy, etc.; R4,R5 = H, halo, alk(en)yl, acyl, Ph, heteroaryl, etc.; R4R5 = atoms to complete a ring; Z = (un)substituted 1,3-phenylene] were prepd. as **herbicides** (no data). Thus, 1,3-cyclohexanedione was acylated by 2,4-dichloro-3-(1-propenyl)benzoyl chloride to give title compd. II.

IT **215659-75-9P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 2-(3-alkenylbenzoyl)cyclohexane-1,3-diones as **herbicides**)

RN 215659-75-9 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2,4-dichloro-3-(1-propenyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)

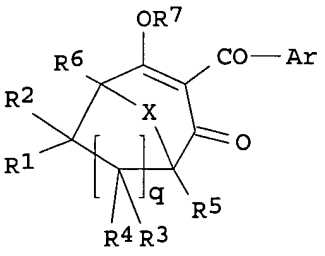


REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 72 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:594454 CAPLUS
DOCUMENT NUMBER: 129:199316
TITLE: Preparation of substituted benzoyl (hetero)cyclic diones as **herbicides**.
INVENTOR(S): Lee, Shy-fuh; Nishizaka, Takashi; Komatsubara, Kenichi
PATENT ASSIGNEE(S): Sandoz Ltd., Switz.
SOURCE: U.S., 11 pp., Cont.-in-part of U. S. Ser. No. 182,534, abandoned.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5801120	A	19980901	US 1989-411086	19890922
HU 49842	A2	19891128	HU 1989-1707	19890410
HU 206242	B	19921028		
US 5608101	A	19970304	US 1995-447524	19950523
US 5700762	A	19971223	US 1995-448008	19950523

PRIORITY APPLN. INFO.: US 1988-182534 19880418
HU 1989-1707 19890410
US 1989-411086 19890922
OTHER SOURCE(S): MARPAT 129:199316
GI

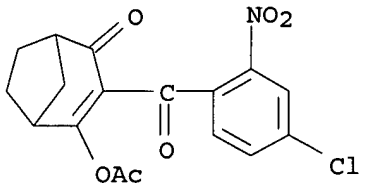


I

AB Substituted aryl or heteroaryl in particular benzoyl bicycloalkanediones and related compds. I [Ar = substituted Ph or pyrimidinyl; X = O, S or alkylene; R1-6 = H, alkyl CO2H or alkoxycarbonyl; R7 = H, alkyl, (un)substituted alkylcarbonyl; q = 0, 1 or 2] are prepd. as **herbicides**.

IT **126657-03-2P**
RL: AGR (Agricultural use); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. as **herbicide**)

RN 126657-03-2 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(acetyloxy)-3-(4-chloro-2-nitrobenzoyl)- (9CI) (CA INDEX NAME)

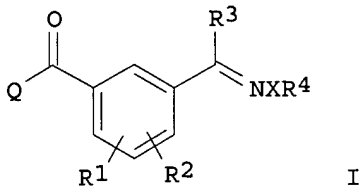


REFERENCE COUNT: 9 THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 73 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:485037 CAPLUS
DOCUMENT NUMBER: 129:108900
TITLE: Preparation of substituted 2-benzoylcyclohexane-1,3-diones as **herbicides**.
INVENTOR(S): Hill, Regina Luise; Kardorff, Uwe; Rack, Michael; Baumann, Ernst; Von Deyn, Wolfgang; Engel, Stefan; Mayer, Guido; Otten, Martina; Rheinheimer, Joachim; Witschel, Matthias; Misslitz, Ulf; Walter, Helmut; Westphalen, Karl-Otto
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: PCT Int. Appl., 74 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9829384	A1	19980709	WO 1997-EP7214	19971219
W: AL, AU, BG, BR, BY, CA, CN, CZ, GE, HU, ID, IL, JP, KR, KZ, LT, LV, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TR, UA, US, UZ, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
DE 19700019	A1	19980709	DE 1997-19700019	19970103
AU 9857626	A1	19980731	AU 1998-57626	19971219
AU 742501	B2	20020103		
EP 958276	A1	19991124	EP 1997-953895	19971219
EP 958276	B1	20020313		
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT				
CN 1245488	A	20000223	CN 1997-181600	19971219
BR 9714258	A	20000418	BR 1997-14258	19971219
JP 2001507690	T2	20010612	JP 1998-529590	19971219
NZ 336879	A	20010928	NZ 1997-336879	19971219
AT 214363	E	20020315	AT 1997-953895	19971219
ZA 9800006	A	19990702	ZA 1998-6	19980102

PRIORITY APPLN. INFO.: DE 1997-19700019 A 19970103
WO 1997-EP7214 W 19971219
OTHER SOURCE(S): MARPAT 129:108900
GI



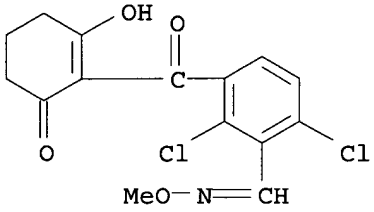
I

AB Title compds. [I; R1, R2 = H, NO2, halo, cyano, rhodano, alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl, OR5, OCOR6, OSO2R6, SH, S(O)nR7, SO2OR5, SO2NR5R8, NR8SO2R6, NR8COR6; R3 = H, cyano, alkyl, haloalkyl, OR7, SR7, NR7R10; R4 = H, (substituted) alkyl, cycloalkyl, alkenyl, cycloalkenyl, alkynyl, COR9, CO2R9, COSR9, CONR8R9; X = O, NR8; n = 0, 1, 2; R5 = H, alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl; R6 = alkyl, haloalkyl; R7 = alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl; R8 = H, alkyl; R9 = alkyl, alkenyl, alkynyl, Ph, PhCH2; R10 = alkyl, haloalkyl, alkenyl, alkynyl; Q = (substituted) 2-cyclohexane-1,3-dione], were prepd. as **herbicides** (no data). Thus, 2,4-dichloro-3-propargyloxyiminomethylbenzoic acid in MeCN was treated with dimedone and DCC followed by 12 h stirring to give a residue which was stirred 3 h with acetone cyanohydrin and Et3N in MeCN to give 2-(2,4-dichloro-3-propargyloxyiminomethylbenzoyl)-5,5-dimethyl-1,3-cyclohexanedione.

IT **209865-85-0P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of substituted 2-benzoylcyclohexane-1,3-diones as **herbicides**)

RN 209865-85-0 CAPLUS

CN Benzaldehyde, 2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]-, 1-(O-methyloxime) (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 74 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:485036 CAPLUS
DOCUMENT NUMBER: 129:122457
TITLE: Preparation of 2-[3-amino(thio)carbonylbenzoyl]-cyclohexan-1,3-diones as **herbicides**.
INVENTOR(S): Kardorff, Uwe; Hill, Regina Luise; Rack, Michael; Von Deyn, Wolfgang; Engel, Stefan; Otten, Martina; Witschel, Matthias; Baumann, Ernst; Rheinheimer, Joachim; Mayer, Guido; Misslitz, Ulf; Westphalen, Karl-Otto; Walter, Helmut
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: PCT Int. Appl., 137 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent

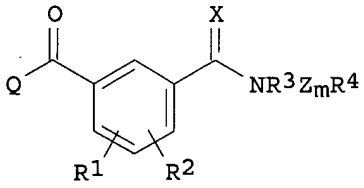
09/ 943,037

LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9829383	A1	19980709	WO 1997-EP7211	19971219
W: AL, AU, BG, BR, BY, CA, CN, CZ, GE, HU, ID, IL, JP, KR, KZ, LT, LV, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TR, UA, US, UZ, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
DE 19700097	A1	19980709	DE 1997-19700097	19970103
AU 9859850	A1	19980731	AU 1998-59850	19971219
AU 744155	B2	20020214		
EP 960095	A1	19991201	EP 1997-954746	19971219
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT				
CN 1245487	A	20000223	CN 1997-181577	19971219
BR 9714256	A	20000418	BR 1997-14256	19971219
NZ 336450	A	20010525	NZ 1997-336450	19971219
JP 2001511118	T2	20010807	JP 1998-529589	19971219
ZA 9800008	A	19990702	ZA 1998-8	19980102
US 6310245	B1	20011030	US 1999-331637	19990623

PRIORITY APPLN. INFO.: DE 1997-19700097 A 19970103
WO 1997-EP7211 W 19971219

OTHER SOURCE(S): MARPAT 129:122457
GI



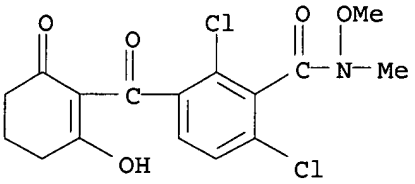
I

AB Title compds. [I; R1, R2 = H, NO2, halo, cyano, rhodano, alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl, OR5, OCOR6, OSO2R6, SH, S(O)nR7, SO2OR5, SO2NR5R8, NR8SO2R6, NR8COR6; R3 = H, alkyl, haloalkyl, alkynyl; R4 = H, (substituted) alkyl, cycloalkyl, alkenyl, cycloalkenyl, alkynyl, COR9, CO2R9, COSR9, CONR8R9; X = O, S; m = 0, 1; n = 0, 1, 2; R5 = H, alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl; R6 = alkyl, haloalkyl; R7 = alkyl, haloalkyl, alkoxyalkyl, alkenyl, alkynyl; R8 = H, alkyl; R9 = alkyl, alkenyl, alkynyl, Ph PhCH2; R10 = alkyl, haloalkyl, alkenyl, alkynyl; Q = (substituted) cyclohexan-1,3-dion-2-yl; m = 1 when R3 = H], were prepd. as **herbicides** (no data). Thus, a mixt. of Et3N and 1,3-cyclohexanedione in CH2Cl2 was treated with 2,4-dichloro-3-(N-ethyl-N-propoxyaminocarbonyl)benzoyl chloride (prepn. given) followed by 2 h stirring to give 2-[2,4-dichloro-3-(N-ethyl-N-propoxyaminocarbonyl)benzoyl]-1,3-cyclohexanedione.

IT **210157-29-2P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 2-[3-amino(thio)carbonylbenzoyl]- cyclohexan-1,3-diones as **herbicides**)

RN 210157-29-2 CAPLUS

CN Benzamide, 2,6-dichloro-3-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]-N-methoxy-N-methyl- (9CI) (CA INDEX NAME)

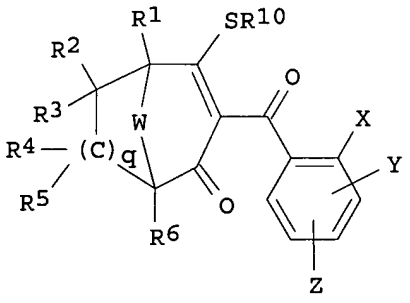


REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

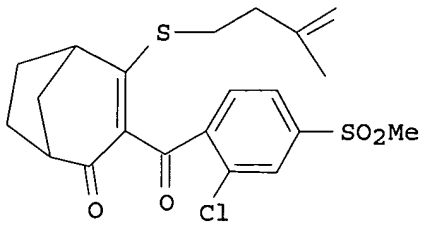
L7 ANSWER 75 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:263316 CAPLUS
DOCUMENT NUMBER: 128:270402
TITLE: Preparation of benzoyl cyclic enone derivatives as **herbicides**
INVENTOR(S): Palmer, Christopher John; Kikukawa, Hiroshi; Sano, Makiko; Isogai, Akihiko
PATENT ASSIGNEE(S): Ishihara Sangyo Kaisha, Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 25 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 10109972	A2	19980428	JP 1997-120268	19970422

PRIORITY APPLN. INFO.: JP 1996-130880 19960426
JP 1996-234673 19960815
OTHER SOURCE(S): CASREACT 128:270402; MARPAT 128:270402
GI



I



II

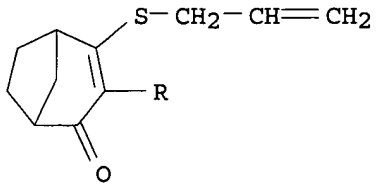
AB The title compds. [I; R1-R6 = H, C1-8 alkyl; q = 0-2; W = CR7R8; R7, R8 = H, Me; X = halo, NO2, cyano, etc.; Y, Z = H, halo, NO2, cyano, (un)substituted alkyl, etc.; R10 = ethylene or acetylene bond-contg. alkyl, cycloalkyl, etc.] are prepd. I are useful as **herbicides**. Thus, 3-(2-chloro-4-methylsulfonylbenzoyl)bicyclo-[3.2.1]-octan-2,4-dione (prepn. given) was treated with ClCOCOCl and then reacted with MeC(:CH2)CH2CH2SH in the presence of Et3N to give 78% the title compd. (II). II at 500 g/ha postemergence showed 95% herbicidal effect for Digitaria adscendens.

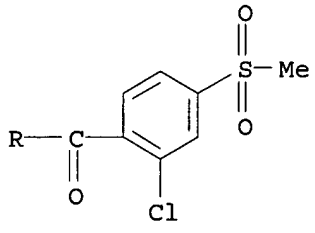
IT **205593-42-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except

adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzoyl cyclic enone derivs. as **herbicides**)

RN 205593-42-6 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(2-propenylthio)- (9CI) (CA INDEX NAME)





L7 ANSWER 76 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:95030 CAPLUS
DOCUMENT NUMBER: 128:177234
TITLE: Synergistic **herbicide** compositions containing bicyclooctenone and oxazinone for paddy
INVENTOR(S): Yamada, Yuji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 10036205	A2	19980210	JP 1996-190463	19960719

PRIORITY APPLN. INFO.: JP 1996-190463 19960719

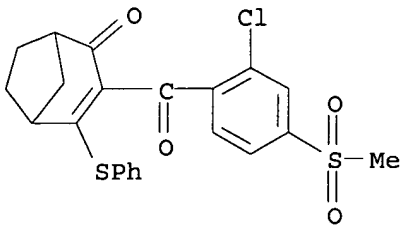
AB Title compns., which show broad-spectrum herbicidal activity, contain 3-(2-chloro-4-methylsulfonylbenzoyl)-4-phenylthiobicyclo[3.2.1]oct-3-en-2-one (I) and 6-methyl-3-[1-methyl-1-(3,5-dichlorophenyl)ethyl]-5-phenyl-2,3-dihydro-4H-1,3-oxazin-4-one (II). Preemergence application of I and II at 150 and 50 g/ha, resp., showed complete control of Echinochloa crus-galli, Scirpus juncoides, Monochoria vaginalis, and Cyperus serotinus with no damage on rice, vs. poor effect, for I or II alone. A wettable powder was prepd. from I 7.0, II 2.0, Na alkylbenzenesulfonate 2.0, Na naphthalenesulfonate-formalin condensate 3.0, white carbon 3.0, and clay 83.0 wt. parts.

IT **203307-33-9**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** contg. bicyclooctenone and oxazinone

for paddy)
RN 203307-33-9 CAPLUS
CN 4H-1,3-Oxazin-4-one, 3-[1-(3,5-dichlorophenyl)-1-methylethyl]-2,3-dihydro-6-methyl-5-phenyl-, mixt. with 3-[2-chloro-4-(methylsulfonyl)benzoyl]-4-(phenylthio)bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

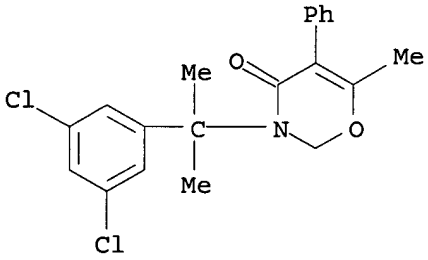
CM 1

CRN 156963-66-5
CMF C22 H19 Cl O4 S2



CM 2

CRN 153197-14-9
CMF C20 H19 Cl2 N O2



L7 ANSWER 77 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:1458 CAPLUS
DOCUMENT NUMBER: 128:61512
TITLE: Preparation of herbicidal pyridinyl and pyrazolylphenyl ketones
INVENTOR(S): Patel, Kanu Maganbhai; Rorer, Morris Padgett; Tseng, Chi-Ping
PATENT ASSIGNEE(S): E.I. Du Pont De Nemours and Company, USA; Patel, Kanu Maganbhai; Rorer, Morris Padgett; Tseng, Chi-Ping
SOURCE: PCT Int. Appl., 165 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9746530	A1	19971211	WO 1997-US9569	19970602

W: AL, AM, AU, AZ, BA, BB, BG, BR, BY, CA, CN, CU, CZ, EE, GE, HU, IL, IS, JP, KG, KP, KR, KZ, LC, LK, LR, LT, LV, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TJ, TM, TR, TT, UA, US, UZ,

VN, YU, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG

CA 2257196	AA	19971211	CA 1997-2257196	19970602
AU 9732973	A1	19980105	AU 1997-32973	19970602
EP 922032	A1	19990616	EP 1997-928809	19970602
R: DE, FR, IT				
ZA 9704916	A	19990126	ZA 1997-4916	19970604

PRIORITY APPLN. INFO.:	US 1996-19352P	P	19960606
	US 1996-33633P	P	19961220
	WO 1997-US9569	W	19970602

OTHER SOURCE(S): MARPAT 128:61512
GI

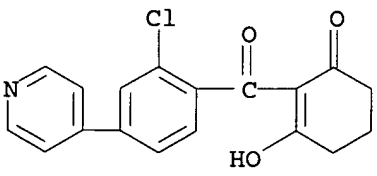
* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB The title compds. [I; Q = II-IV, R10C(O)CHR11; A = 5-10 membered monocyclic or fused bicyclic ring system; R1 = H, C1-6 alkyl, halo, etc.; W = N, CH; R3 = SH, C1-6 alkylthio, phenylthio, etc.; R4 = C1-3 alkyl, C1-3 alkoxy, C1-3 alkylthio, halo; R5 = SH, C1-6 alkylthio, phenylthio, etc.; R6 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R7 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R8 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R9 = H, C2-6 alkoxycarbonyl, CN, etc.; R10 = C1-6 alkyl, C1-6 haloalkyl, (un)substituted C3-6 cycloalkyl; R11 = CN, C2-6 alkoxycarbonyl, C2-6 alkylcarbonyl, etc.; m = 0-3; p = 0-4] and their (N)-oxides and agriculturally suitable salts, useful for controlling undesired vegetation, were prepd. Thus, treatment of 2,5-dimethyl-3-(1-methyl-1H-pyrazol-3-yl)-4-(methylsulfonyl)benzoic acid with oxalyl chloride and DMF in CH2Cl2 followed by reaction of the acid chloride with 1,3-cyclohexanedione in the presence of Et3N in CH2Cl2, and treatment of the resulting 3-oxo-1-cyclohexen-1-yl 2,5-dimethyl-3-(1-methyl-1H-pyrazol-3-yl)-4-(methylsulfonyl)benzoate with acetone cyanohydrin and Et3N in MeCN afforded the title compd. V which showed complete control against, e.g., redroot pigweed and speedwell in postemergence tests.

IT **200273-20-7P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of herbicidal pyridinyl and pyrazolylphenyl ketones)

RN 200273-20-7 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(4-pyridinyl)benzoyl]-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 78 OF 149 CAPLUS COPYRIGHT 2003 ACS

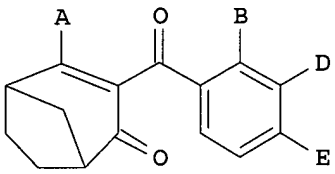
ACCESSION NUMBER:	1997:385512 CAPLUS
DOCUMENT NUMBER:	127:14448
TITLE:	**Herbicide** mixtures containing benzoyl cyclic enon derivatives for rice paddies
INVENTOR(S):	Yamada, Yuji; Koyanagi, Hiroshi; Torii, Hitoshi;

09/ 943,037

	Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S):	SDS Biotech Corp., Japan
SOURCE:	Jpn. Kokai Tokkyo Koho, 32 pp.
	CODEN: JKXXAF
DOCUMENT TYPE:	Patent
LANGUAGE:	Japanese
FAMILY ACC. NUM. COUNT:	3
PATENT INFORMATION:	

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09104604	A2	19970422	JP 1996-221761	19960805

PRIORITY APPLN. INFO.: JP 1995-222668 19950808
OTHER SOURCE(S): MARPAT 127:14448
GI



I

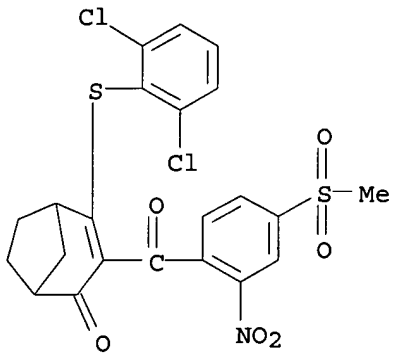
AB A mixt. consists of substituted benzoyl cyclic enon deriv. [I; A = S(O)nR1, R1 = (substituted)alkyl, cycloalkyl, (substituted)benzyl, (substituted)ph; n = 0,2, or OR2 (R2 = (substituted)ph); B = halo, nitro, etc.; D = H, alkyl, etc.; E = alkylthio, alkylsulfonyl, etc.] in combination with .gtoreq. 1 compd. selected from the group comprising **herbicides** of acetanilides, thiocarbamates, thioates, sulfonyltriazole carboxamides. A small amt. of the mixt. is effective enough to control varieties of weeds in rice paddies.

IT **190133-81-4**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(**herbicide** mixts. contg. benzoyl cyclic enon derivs. for rice paddies)

RN 190133-81-4 CAPLUS
CN Acetamide, 2-chloro-N-(2,6-dimethylphenyl)-N-[(3-methoxy-2-thienyl)methyl]-, mixt. with 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

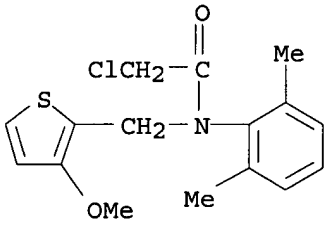
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

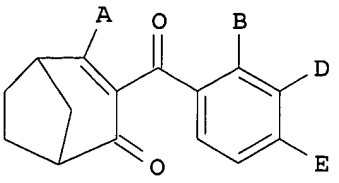
CRN 96491-05-3
CMF C16 H18 Cl N O2 S



L7 ANSWER 79 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:356478 CAPLUS
DOCUMENT NUMBER: 127:14450
TITLE: Benzoyl cyclic enon derivative **herbicide** mixtures for rice paddies
INVENTOR(S): Yamada, Yuji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 16 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 3
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09104602	A2	19970422	JP 1996-221759	19960805

PRIORITY APPLN. INFO.: JP 1995-222668 19950808
OTHER SOURCE(S): MARPAT 127:14450
GI



I

AB A **herbicide** mixt. effective in controlling weeds in rice paddies contains (1) a substituted benzoyl cyclic enon deriv. I [A = S(O)nR1 (R1 = (substituted)alkyl, cycloalkyl, (substituted)benzyl, (substituted)ph; n = 0,2), or OR2 (R2 = (substituted)ph); B = halo, nitro, etc.; D = H, alkyl, etc.; E = alkylthio, alkylsulfonyl, etc.], and (2) mefenacet or NBA-061 [1-(2-chlorophenyl)-4-(N-cyclohexyl-N-ethylcarbamoyl)-5(4H)-tetrazolinone].

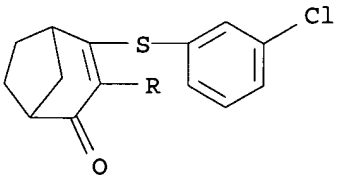
IT **189514-08-7**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(benzoyl cyclic enon deriv. **herbicide** mixts. for rice paddies)

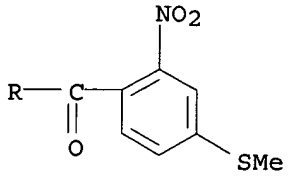
RN 189514-08-7 CAPLUS

CN Acetamide, 2-(2-benzothiazolyloxy)-N-methyl-N-phenyl-, mixt. with 4-[(3-chlorophenyl)thio]-3-[4-(methylthio)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

CM 1

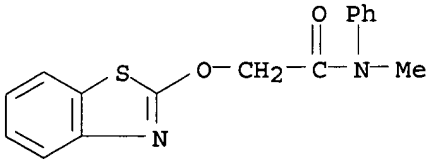
CRN 156963-63-2
CMF C22 H18 Cl N O4 S2





CM 2

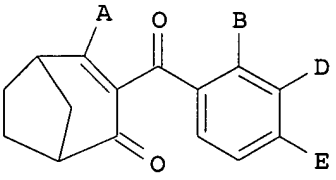
CRN 73250-68-7
CMF C16 H14 N2 O2 S



L7 ANSWER 80 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:356477 CAPLUS
DOCUMENT NUMBER: 127:14449
TITLE: Benzoyl cyclic enon derivative **herbicide** mixtures for rice paddies
INVENTOR(S): Yamada, Yuji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 20 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 3
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09104603	A2	19970422	JP 1996-221760	19960805

PRIORITY APPLN. INFO.: JP 1995-222668 19950808
OTHER SOURCE(S): MARPAT 127:14449
GI



I

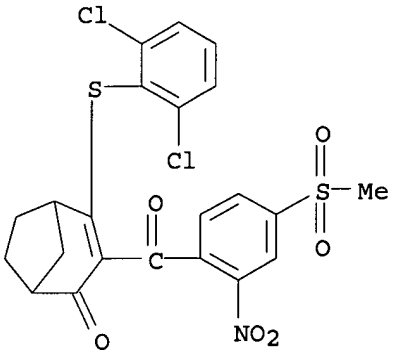
AB A **herbicide** mixt. effective in controlling weeds in rice paddies contains (1) a substituted benzoyl cyclic enon deriv. I [A = S(O)nR1 (R1 = (substituted)alkyl, cycloalkyl, (substituted)benzyl, (substituted)ph; n = 0,2), or OR2 (R2 = (substituted)ph; B = halo, nitro, etc.; D = H, alkyl, etc.; E = alkylthio, alkylsulfonyl, etc.], and (2) pretilachlor or dimethametryn.

IT **189513-27-7**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(benzoyl cyclic enon deriv. **herbicide** mixts. for rice paddies)

RN 189513-27-7 CAPLUS
CN Acetamide, 2-chloro-N-(2,6-diethylphenyl)-N-(2-propoxyethyl)-, mixt. with 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

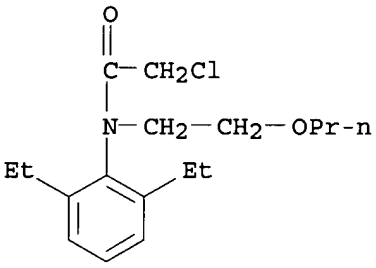
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

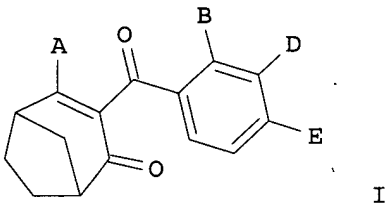
CRN 51218-49-6
CMF C17 H26 Cl N O2



L7 ANSWER 81 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:315006 CAPLUS
DOCUMENT NUMBER: 127:14458
TITLE: Synergistic **herbicides** for rice paddies
INVENTOR(S): Yamada, Yuji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): SDS Biotech Corp., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 23 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09077613	A2	19970325	JP 1995-258108	19950911

PRIORITY APPLN. INFO.: JP 1995-258108 19950911
OTHER SOURCE(S): MARPAT 127:14458
GI



I

AB A synergistic **herbicide** consists of (1) substituted benzoyl cyclic enon deriv. I where A = S(O)nR1 (R1 = lower alkyl, cycloalkyl, (substituted)benzyl, (substituted amino substituted)ph; n = 0,2), or A = OR2 [R2 = (substituted)ph]; B = halo, nitro, lower alkyl, lower alkylsulfonyl; D = H, lower alkyl, lower alkoxy, lower alkoxymethyl, lower alkoxycarbonyl; E = halo, (substituted) lower alkoxy, lower alkylthio, lower alkylsulfonyl, lower alkylsulfonyloxy, and (2) triazines, naphthoquinones, carbothioates, oxadiazoles, or benzothiadiazines.

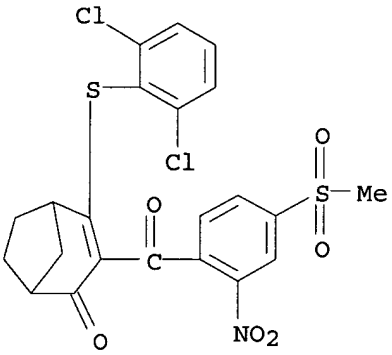
IT **189065-01-8**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** for rice paddies)

RN 189065-01-8 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]-, mixt. with N,N'-diethyl-6-(methylthio)-1,3,5-triazine-2,4-diamine (9CI) (CA INDEX NAME)

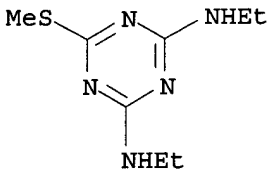
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

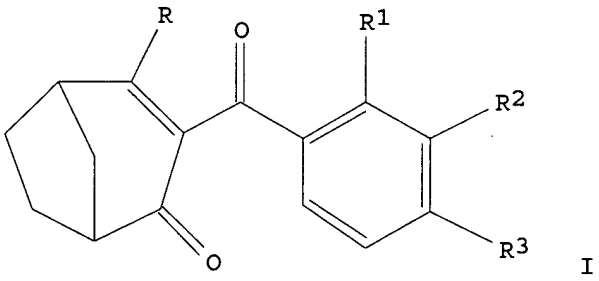
CRN 1014-70-6
CMF C8 H15 N5 S



L7 ANSWER 82 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:309716 CAPLUS
DOCUMENT NUMBER: 126:289426
TITLE: **Herbicides** containing benzoyl cyclic enones and halogen-substituted phenoxy derivatives for use in rice fields
INVENTOR(S): Yamada, Juji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 45 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09052807	A2	19970225	JP 1995-222666	19950808
JP 09165303	A2	19970624	JP 1996-265199	19950808

PRIORITY APPLN. INFO.: JP 1995-222666 19950808
OTHER SOURCE(S): MARPAT 126:289426
GI



I

AB Herbicidal compns. for use in paddies contain I [R = S(O)nR4 (R4 = (un)substituted lower alkyl, cycloalkyl, (un)substituted benzyl or Ph, (un)substituted PhO, n = 0 or 2); R1 = halo, NO2, lower alkyl or alkylsulfonyl; R2 = H, lower alkyl, alkoxy, alkoxymethyl, or alkoxycarbonyl; R3 = halo, (un)substituted lower alkoxy, lower alkylthio, alkylsulfonyl, or alkylsulfonyloxy] and halogen-substituted phenoxy derivs. Thus, a herbicidal compn. contg. I (R = 2,6-dichlorothiophenyl, R1 = NO2, R2 = H, R3 = SO2Me) 0.1 and nitrofen 0.9 kg/ha completely controlled Echinochloa crus-galli, Scirpus juncoides, Monochoria vaginalis, Cyperus serotinus with no damage to rice.

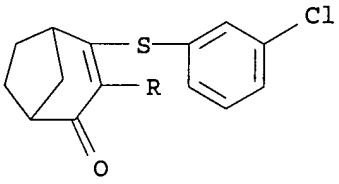
IT **188887-00-5**
RL: AGR (Agricultural use); BIOL (Biological study); USES (Uses)
(herbicidal mixt. formulation for rice fields)

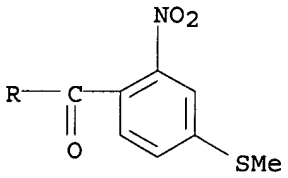
RN 188887-00-5 CAPLUS
CN 1,3,4-Oxadiazol-2(3H)-one, 3-[2,4-dichloro-5-(1-methylethoxy)phenyl]-5-

(1,1-dimethylethyl)-, mixt. with 4-[(3-chlorophenyl)thio]-3-[4-(methylthio)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

CM 1

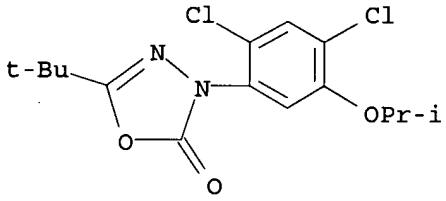
CRN 156963-63-2
CMF C22 H18 Cl N O4 S2





CM 2

CRN 19666-30-9
CMF C15 H18 Cl2 N2 O3



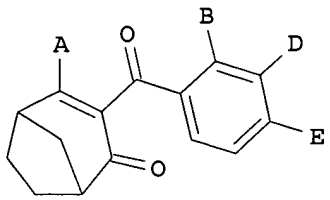
L7 ANSWER 83 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:276098 CAPLUS
DOCUMENT NUMBER: 126:247839
TITLE: Synergistic **herbicides** for rice paddy
INVENTOR(S): Yamada, Juji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 20 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09052808	A2	19970225	JP 1995-224665	19950809

PRIORITY APPLN. INFO.: JP 1995-224665 19950809
OTHER SOURCE(S): MARPAT 126:247839

09/ 943,037

GI



I

AB The **herbicides** are (1) substituted benzoylcyclic enone derivs. I [A = S(O)nR1 where R1 = lower alkyl, cycloalkyl, (substituted) benzyl, (substituted amino-substituted)ph; n = 0, 2; or OR2 where R2 = (substituted)ph; B = halo, nitro, lower alkyl, lower alkylsulfonyl; D = H, lower alkyl, lower alkoxy, lower alkoxymethyl, lower alkoxycarbonyl; E = halo, (substituted) lower alkoxy, lower alkylthio, lower alkylsulfonyl, lower alkylsulfonyloxy], and (2) 1-benzyl-3-aryl(alkyl) substituted urea derivs. A small amt. of the **herbicides** is effective against monocotyledoneae and dicotyledoneae for a long period.

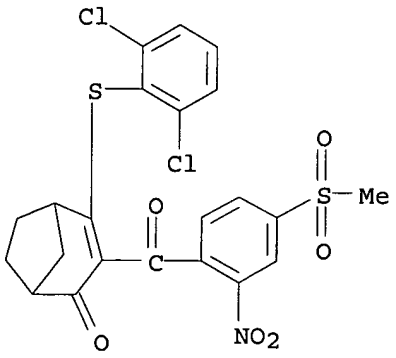
IT **188668-14-6**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** for rice paddy)

RN 188668-14-6 CAPLUS

CN Urea, N-(4-methylphenyl)-N'-(1-methyl-1-phenylethyl)-, mixt. with 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

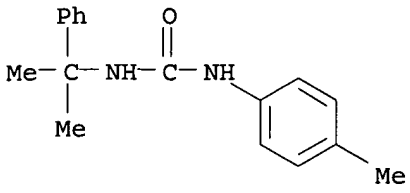
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

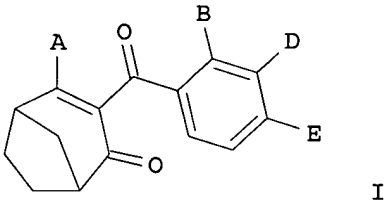
CRN 42609-52-9
CMF C17 H20 N2 O



L7 ANSWER 84 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:276097 CAPLUS
DOCUMENT NUMBER: 126:247838
TITLE: Synergistic **herbicides** for rice paddy
INVENTOR(S): Yamada, Juji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 21 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09052809	A2	19970225	JP 1995-222667	19950808

PRIORITY APPLN. INFO.: JP 1995-222667 19950808
OTHER SOURCE(S): MARPAT 126:247838
GI

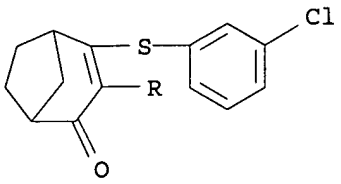


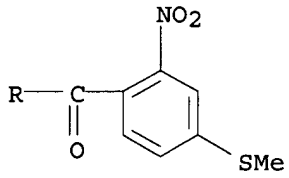
I

AB The **herbicides** are (1) substituted benzoylcyclic enone derivs. I [A = S(O)nR1 where R1 = lower alkyl, cycloalkyl, (substituted) benzyl, (substituted amino-substituted)ph; n = 0, 2; or OR2 where R2 = (substituted)ph; B = halo, nitro, lower alkyl, lower alkylsulfonyl; D = H, lower alkyl, lower alkoxy, lower alkoxymethyl, lower alkoxycarbonyl; E = halo, (substituted) lower alkoxy, lower alkylthio, lower alkylsulfonyl, lower alkylsulfonyloxy], and (2) halogen-substituted benzoylpyrazole derivs. A small amt. of the **herbicides** is effective against monocotyledoneae and dicotyledoneae for a long period.

IT **156963-63-2D**, mixts. contg.
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(synergistic **herbicides** for rice paddy)

RN 156963-63-2 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-[(3-chlorophenyl)thio]-3-[4-(methylthio)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)

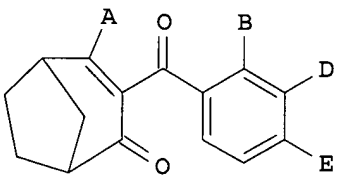




L7 ANSWER 85 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:204058 CAPLUS
DOCUMENT NUMBER: 126:208536
TITLE: **Herbicide** mixtures containing benzoylcyclic enon derivatives and sulfonylureas
INVENTOR(S): Yamada, Juji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 38 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09030910	A2	19970204	JP 1995-209003	19950725
CN 1145720	A	19970326	CN 1996-110697	19960724

PRIORITY APPLN. INFO.: JP 1995-209003 19950725
JP 1995-209004 19950725
OTHER SOURCE(S): MARPAT 126:208536
GI



I

AB A small amt. of mixt. of **herbicides** is effective in controlling weeds in rice paddies. The mixt. is I [A = S(O)nR1 where R1 = lower alkyl, cycloalkyl, (substituted)benzyl, (substituted amino)ph; n = 0,2; OR2 [R2 = (substituted)ph]; B = halo, NO2, lower alkyl, lower alkylsulfonyl; D = H, lower alkyl, lower alkoxy, lower alkoxymethyl, lower alkyloxycarbonyl; E = halo, (substituted) alkoxy, lower alkylthio, lower alkyl sulfonyl, lower alkylsulfonyloxy] in combination with sulfonylurea derivs. such as bensulfuron-Me and pyrazosulfuron-Et.
IT **187602-99-9**

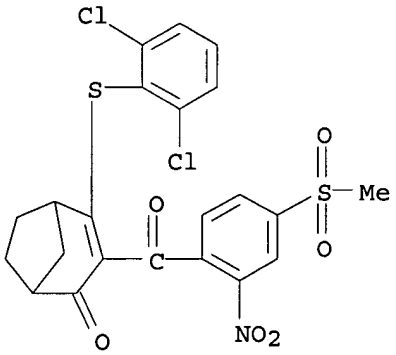
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(**herbicide** mixts. contg. benzoylcyclic enon derivs. and sulfonylureas)

RN 187602-99-9 CAPLUS

CN Benzoic acid, 2-[[[[[(4,6-dimethoxy-2-pyrimidinyl)amino]carbonyl]amino]sulfonyl]methyl]-, methyl ester, mixt. with 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

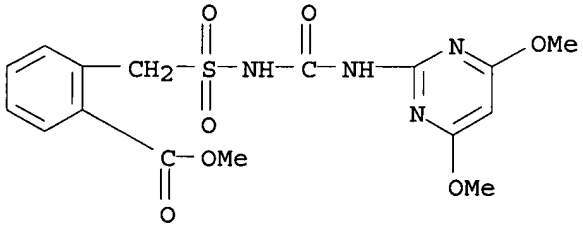
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

CRN 83055-99-6
CMF C16 H18 N4 O7 S



L7 ANSWER 86 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1997:195676 CAPLUS
DOCUMENT NUMBER: 126:208535
TITLE: **Herbicide** mixtures containing benzoylcyclic enon derivatives and phenoxyacetate derivatives
INVENTOR(S): Yamada, Juji; Koyanagi, Hiroshi; Torii, Hitoshi; Fujita, Akihiko; Sato, Tadashi; Sekino, Keisuke
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 17 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 2

09/ 943,037

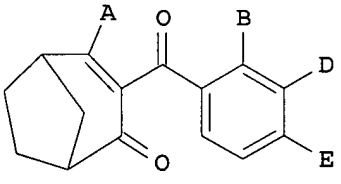
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 09030904	A2	19970204	JP 1995-209004	19950725
CN 1145720	A	19970326	CN 1996-110697	19960724

PRIORITY APPLN. INFO.: JP 1995-209003 19950725
JP 1995-209004 19950725

OTHER SOURCE(S): MARPAT 126:208535

GI



I

AB A small amt. of mixt. of **herbicides** is effective in controlling weeds in rice paddies for a long period. The mixt. is I [A = S(O)nR1 where R1 = lower alkyl, cycloalkyl, (substituted)benzyl, (substituted amino)ph; n = 0,2, or OR2 (R2 = (substituted)ph); B = halo, NO2, lower alkyl, lower alkylsulfonyl; D = H, lower alkyl, lower alkoxy, lower alkoxymethyl, lower alkyloxycarbonyl; E = halo, (substituted) alkoxy, lower alkylthio, lower alkyl sulfonyl, lower alkylsulfonyloxy] in combination with phenoxyacetate derivs. such as (RS)-2-(2,4-dichloro-m-tolyloxy)propionanilide, N-phenyl-2-(2-naphthoxy)propionamide, S-ethyl-4-chloro-o-tolyloxythioacetate, 4-(4-chloro-o-tolyloxy) butyrate, and 2,4-dichlorophenoxy acetate.

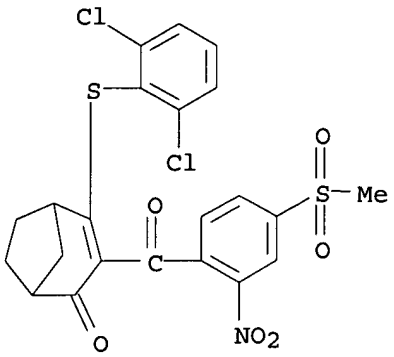
IT **187595-71-7**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(**herbicide** mixts. contg. benzoylcyclic enon derivs. and phenoxyacetate derivs.)

RN 187595-71-7 CAPLUS

CN Propanamide, 2-(2,4-dichloro-3-methylphenoxy)-N-phenyl-, mixt. with 4-[(2,6-dichlorophenyl)thio]-3-[4-(methylsulfonyl)-2-nitrobenzoyl]bicyclo[3.2.1]oct-3-en-2-one (9CI) (CA INDEX NAME)

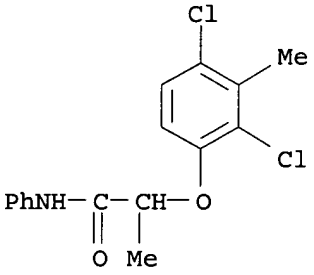
CM 1

CRN 156963-43-8
CMF C22 H17 Cl2 N O6 S2



CM 2

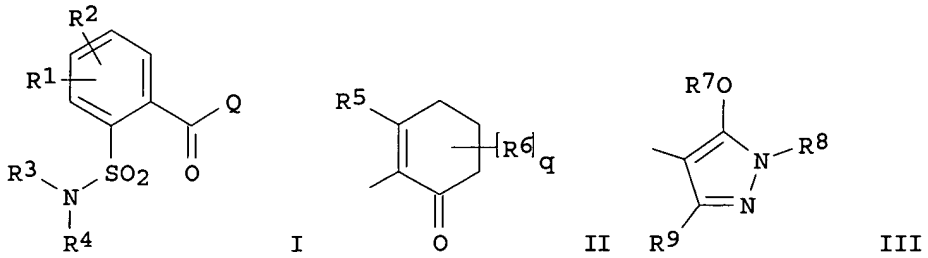
CRN 84496-56-0
CMF C16 H15 Cl2 N O2

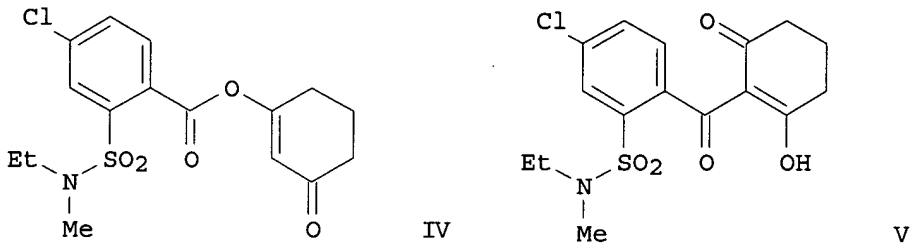


L7 ANSWER 87 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:175203 CAPLUS
DOCUMENT NUMBER: 126:171591
TITLE: Preparation of herbicidal 2-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]- or 2-[(1H-pyrazol-4-yl)carbonyl]benzenesulfonamides
INVENTOR(S): Stevenson, Thomas Martin; Patel, Kanu Maganbhai
PATENT ASSIGNEE(S): E.I. Du Pont De Nemours and Company, USA; Stevenson, Thomas Martin; Patel, Kanu Maganbhai
SOURCE: PCT Int. Appl., 86 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9703045	A1	19970130	WO 1996-US11345	19960703
W: AL, AM, AU, AZ, BB, BG, BR, BY, CA, CN, CZ, EE, GE, HU, IL, IS, JP, KG, KP, KR, KZ, LK, LR, LT, LV, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TJ, TM, TR, TT, UA, US, UZ, VN, AM, AZ, BY, KG				
RW: KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
AU 9664839	A1	19970210	AU 1996-64839	19960703

EP 850218 A1 19980701 EP 1996-924365 19960703
R: DE, FR
JP 11509202 T2 19990817 JP 1996-505912 19960703
PRIORITY APPLN. INFO.: US 1995-1017P P 19950710
WO 1996-US11345 W 19960703
OTHER SOURCE(S): CASREACT 126:171591; MARPAT 126:171591
GI



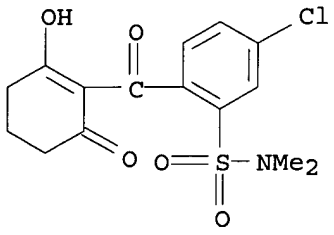


AB The title compds. [I; R1, R2 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R3 = H, C1-6 alkyl, C3-6 alkenyl, etc.; R4 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R3R4 = (CH2)2, (CH2)3, etc.; Q = II, III (wherein R5 = C1-6 alkylthio, C1-6 halothioalkyl, etc.; R6 = C1-3 alkyl, C1-3 alkoxy, etc.; R7 = H, C1-6 alkyl, C1-6 haloalkyl, etc.; R8 = H, C1-6 alkyl, C3-6 alkenyl, etc.; R9 = H, C1-6 alkyl, halo, etc.); q = 0-4], useful for controlling undesired vegetation, were prepd. Thus, treatment of benzoate IV with Et3N, 4-pyrrolidinopyridine and catalytic amt. of acetone cyanohydrin afforded V which showed complete control against sugar beet and velvetleaf in postemergence tests.

IT **187105-74-4P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of herbicidal 2-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]- or 2-[(1H-pyrazol-4-yl)carbonyl]benzenesulfonamides)

RN 187105-74-4 CAPLUS

CN Benzenesulfonamide, 5-chloro-2-[(2-hydroxy-6-oxo-1-cyclohexen-1-yl)carbonyl]-N,N-dimethyl- (9CI) (CA INDEX NAME)



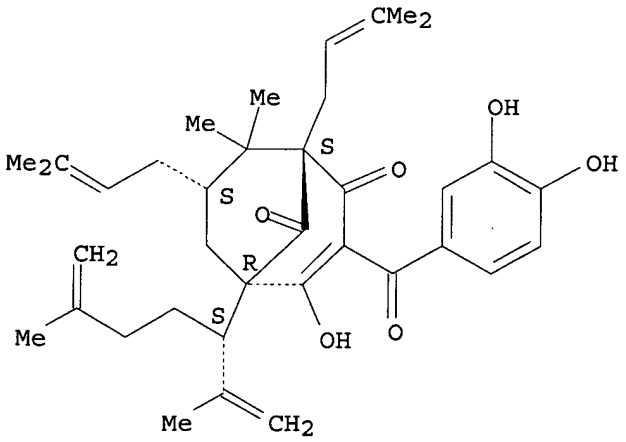
L7 ANSWER 88 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:141814 CAPLUS
DOCUMENT NUMBER: 126:246351
TITLE: Inhibitory activity of xanthone derivatives isolated from some guttiferaeous **plants** against DNA topoisomerases I and II
AUTHOR(S): Tosa, Hideki; Iinuma, Munekazu; Tanaka, Toshiyuki; Nozaki, Hiroshi; Ikeda, Shougo; Tsutsui, Ken; Tsutsui, Kimiko; Yamada, Masashi; Fujimori, Shiho
CORPORATE SOURCE: Dep. Mol. Biology, Gifu Pharm. Univ., Gifu, 502, Japan
SOURCE: Chemical & Phârmaceutical Bulletin (1997), 45(2), 418-420
CODEN: CPBTAL; ISSN: 0009-2363
PUBLISHER: Pharmaceutical Society of Japan
DOCUMENT TYPE: Journal
LANGUAGE: English

AB A xanthone deriv., subelliptenone F, and the related compds. showed an intensive inhibitory effect against topoisomerase I and II in in vitro expts. These xanthones are prospective lead compds. for anticancer drugs. Structure-activity relations are discussed.

IT **188650-51-3**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(inhibitory activity of xanthone derivs. isolated from guttiferaeous **plants** against DNA topoisomerases I and II in relation to structure and potential as anticancer drugs)

RN 188650-51-3 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[4-methyl-1-(1-methylethenyl)-4-pentenyl]-, [1S-[1.alpha.,5.alpha.(R*),7.beta.]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L7 ANSWER 89 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:107515 CAPLUS
DOCUMENT NUMBER: 126:115792
TITLE: **Plant** secondary metabolites for control of methicillin-resistant Staphylococcus aureus
INVENTOR(S): Iinuma, Munekazu
PATENT ASSIGNEE(S): Sugimoto Masami, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 7 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 08259493	A2	19961008	JP 1995-87384	19950320

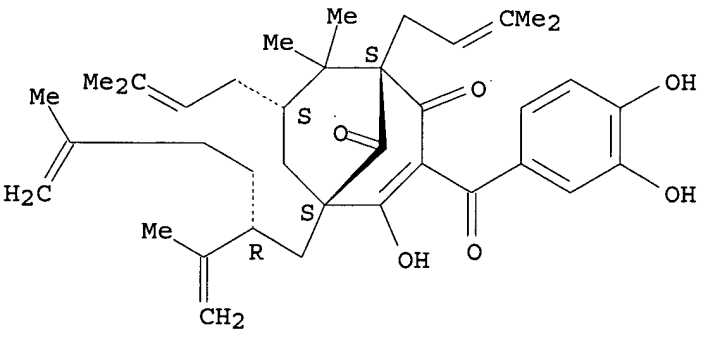
PRIORITY APPLN. INFO.: JP 1995-87384 19950320

AB **Plant** secondary metabolites, i.e. garcinol, isogarcinol, xanthochymol, isoxanthochymol, and cycloxanthochymol, are isolated and purified from pericarp of fruit of Garcinia subelliptica Merr. and other Garcinia. These **plant** secondary metabolites are useful for control of MRSA, and does not have acute toxicity.

IT **52617-32-0P**, Xanthochymol
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); PUR (Purification or recovery); THU (Therapeutic use); BIOL (Biological study); OCCU (Occurrence); PREP (Preparation); USES (Uses)
(**plant** secondary metabolites for control of methicillin-resistant Staphylococcus aureus)

RN 52617-32-0 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2R)-5-methyl-2-(1-methylethenyl)-5-hexenyl]-, (1S,5S,7S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



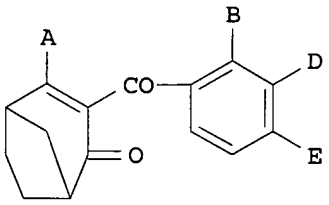
L7 ANSWER 90 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1996:751488 CAPLUS
DOCUMENT NUMBER: 126:31160
TITLE: Preparation of substituted benzoyl cyclic enones as **herbicides**
INVENTOR(S): Komatsubara, Kenichi; Sato, Tadashi; Mikami, Kenji; Yamada, Yuji
PATENT ASSIGNEE(S): Sds Biotech K.K., Japan
SOURCE: Pat. Specif. (Aust.), 46 pp.

09/ 943,037

CODEN: ALXXAP
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
AU 672058	B2	19960919	AU 1993-52802	19931230
AU 9352802	A1	19950713		
IN 177892	A	19970222	IN 1994-MA8	19940107

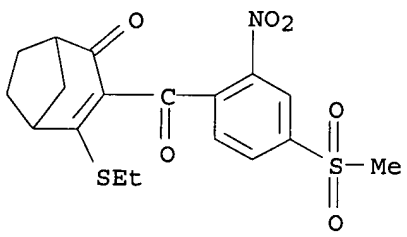
PRIORITY APPLN. INFO.: AU 1993-52802 A 19931230
OTHER SOURCE(S): MARPAT 126:31160
GI



I

AB The title compds. [I; A = S(O)nR1; n = 0-2; R1 = (un)substituted lower alkyl, cycloalkyl, (un)substituted benzyl or Ph, (un)substituted PhO; B = halo, NO2, lower alkyl oralkylsulfonyl; D = H, lower alkyl, alkoxy, alkoxymethyl, or alkoxycarbonyl; E = halo, (un)substituted lower alkoxy or alkylsulfonyl, lower alkylthio or alkylsulfonyloxy] are prepd. I are useful as rice paddy **herbicides** with considerably reduced phytotoxicities on rice **plant**. Thus, 3-(2-chloro-4-methylsulfonylbenzoyl)bicyclo[3.2.1]octane-2,4-dione (prepn. given) was refluxed with SOCl2 in the presence of catalytic amt. of DMF, and then reacted with PhSH in the presence of Et3N to give 95.2% I (A = SPh, B = Cl, D = H, E = SO2Me) (II). **Herbicides** contg. II at 500 g/ha preemergence completely killed Echinochloa crus-galli P. Beauv., Cyperus serotinus Rottb., and Eleocharis kuroguwai Ohwi while no effect on 1 cm and 3 cm rice.

IT **156963-35-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of substituted benzoyl cyclic enones as **herbicides**)
RN 156963-35-8 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(ethylthio)-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



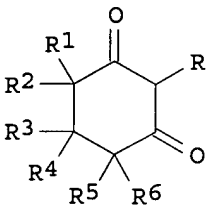
L7 ANSWER 91 OF 149 CAPLUS COPYRIGHT 2003 ACS

09/ 943,037

ACCESSION NUMBER: 1996:623180 CAPLUS
DOCUMENT NUMBER: 125:275856
TITLE: Preparation of 2-(heterocyclylbenzoyl)-1,3-cyclohexanediones as **herbicides**
INVENTOR(S): Von Deyn, Wolfgang; Hill, Regina Luise; Kardorff, Uwe; Engel, Stefan; Otten, Martina; Vossen, Marcus; Plath, Peter; Rang, Harald; Harreus, Albrecht; et al.
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: PCT Int. Appl., 126 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9626200	A1	19960829	WO 1996-EP593	19960213
W: AU, BG, BR, CA, CN, CZ, EE, FI, GE, HU, JP, KR, LT, LV, MX, NO, NZ, PL, SG, SK, TR, UA, US, UZ, VN, AZ, BY, KG, KZ, RU, TJ, TM				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
CA 2213124	AA	19960829	CA 1996-2213124	19960213
AU 9648753	A1	19960911	AU 1996-48753	19960213
AU 703623	B2	19990325		
EP 811005	A1	19971210	EP 1996-904761	19960213
EP 811005	B1	19990929		
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT, LT, LV				
BR 9607420	A	19980623	BR 1996-7420	19960213
JP 11501010	T2	19990126	JP 1996-525357	19960213
AT 185139	E	19991015	AT 1996-904761	19960213
ES 2138323	T3	20000101	ES 1996-904761	19960213
PL 183964	B1	20020830	PL 1996-321891	19960213
ZA 9601445	A	19970825	ZA 1996-1445	19960223
US 6004903	A	19991221	US 1997-894247	19970814
US 6153759	A	20001128	US 1999-226142	19990107

PRIORITY APPLN. INFO.: DE 1995-19506574 A 19950224
WO 1996-EP593 W 19960213
OTHER SOURCE(S): MARPAT 125:275856
GI



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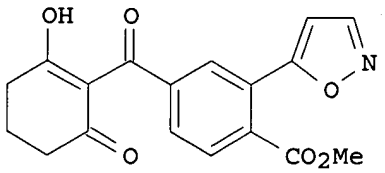


II

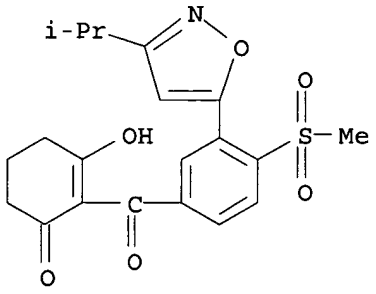
AB Title compds. [I; R = COZR7; R1,R2,R4,R6 = H or alkyl; R5 = H, alkyl, alkoxycarbonyl; R3 = H or (un)substituted (cyclo)alkyl; R7 = heterocyclyl; Z = (un)substituted 1,3-phenylene] were prepd. Thus, Me 3-ethynyl-4-methylsulfonylbenzoate (prepn. given) was cyclocondensed with Me2CHC:NOH and the product converted in 2 steps to the acid chloride which was used to acylate cyclohexane-1,3-dione to give title compd. II. Data for herbicidal activity of 3 I were given.

IT **182182-39-4P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except

adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (prepn. of 2-(heterocyclylbenzoyl)-1,3-cyclohexanediones as **herbicides**)

RN 182182-39-4 CAPLUS

CN 2-Cyclohexen-1-one, 3-hydroxy-2-[3-[3-(1-methylethyl)-5-isoxazolyl]-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 92 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1996:476903 CAPLUS

DOCUMENT NUMBER: 125:142572

TITLE: 3-Benzoylpyridine derivatives, their preparation and their use as **herbicides**

INVENTOR(S): Kanne, David B.

PATENT ASSIGNEE(S): Zeneca Limited, UK

SOURCE: PCT Int. Appl., 27 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

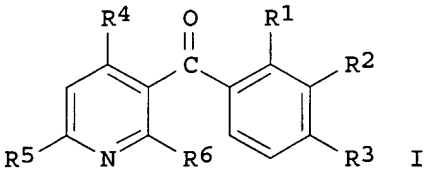
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9617829	A2	19960613	WO 1995-US15840	19951206
WO 9617829	A3	19970213		
W: AL, AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, IS, JP, KE, KG, KP, KR, KZ, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK				
RW: KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
US 5565413	A	19961015	US 1994-352009	19941206
CA 2206740	AA	19960613	CA 1995-2206740	19951206
AU 9645096	A1	19960626	AU 1996-45096	19951206
EP 796246	A1	19970924	EP 1995-943686	19951206
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, MC, NL, PT, SE				
BR 9509951	A	19971014	BR 1995-9951	19951206
CN 1168666	A	19971224	CN 1995-196658	19951206
HU 77881	A2	19980928	HU 1998-1444	19951206
JP 11500410	T2	19990112	JP 1995-517740	19951206

PRIORITY APPLN. INFO.: US 1994-352009 19941206
WO 1995-US15840 19951206

OTHER SOURCE(S): MARPAT 125:142572

GI



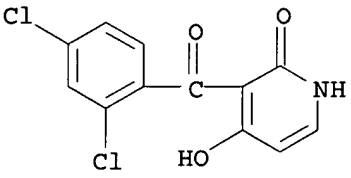
I

AB Fifteen herbicidal compds. I (R1 = H, halo, C1-C4 alkyl; C1-C4 haloalkyl; C1-C4 alkoxy; C1-C4 haloalkoxy; C2-C8 alkoxyalkyl; nitro; cyano; thiocyanato; R7S(O)m,,m = 0-2, R7 = C1-C4 alkyl, C1-C4 haloalkyl; R2, R3 = H; halo; C1-C4 alkyl; C1-C4 alkoxy; C1-C4 haloalkyl; C1-C4 haloalkoxy; C2-C8 alkoxyalkyl; nitro; R8S(O)2O, R8S(O)n, n 0-2, R8 = C1-C4 alkyl, C1-C4 haloalkyl, C1-C4 cyanoalkyl, Ph, benzyl; NR9R10, R9, R10 = H; C1-C4 alkyl; R11CO, R11 = C1-C4 alkyl; C1-C4 alkoxy, SO2NR12R13, R12, R13 = H; C1-C4 alkyl, C1-C4 haloalkyl, N(R14)COR15, R14, R15 = H; C1-C4 alkyl; R4 = H; halo, OH; R5 = H; Me; CF3; R6 = H; halo; OH) were prepd. E.g., 2,4-difluoropyridine was treated with 2-methyl-3-ethoxy-4-(methylsulfonyl)benzaldehyde to give the carbinol which was oxidized to give 2,4-difluoro-3-[3-ethoxy-2-methyl-4-(methylsulfonyl)benzoyl]pyridine.

IT **179382-44-6P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(prepn. and herbicidal activity of benzoylpyridines)

RN 179382-44-6 CAPLUS

CN 2(1H)-Pyridinone, 3-(2,4-dichlorobenzoyl)-4-hydroxy- (9CI) (CA INDEX NAME)

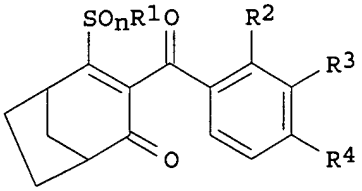


L7 ANSWER 93 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1996:469923 CAPLUS
DOCUMENT NUMBER: 125:135449
TITLE: Preparation of herbicidal substituted benzoyl bicycloalkanediones
INVENTOR(S): Lee, Shy-Fuh
PATENT ASSIGNEE(S): Sandoz Ltd., Switz.
SOURCE: U.S., 5 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5536703	A	19960716	US 1995-372260	19950113

PRIORITY APPLN. INFO.: US 1995-372260 19950113
OTHER SOURCE(S): MARPAT 125:135449
GI



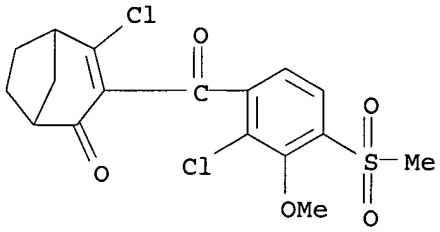
I

AB Thioether derivs. of substituted benzoyl bicycloalkane diones I [R1 = (un)substituted alkyl, Ph or phenytlalkyl; R2 = halo, alkyl, haloalkyl, nitro; R3 = alkoxy, alkoxycarbonyl, alkoxyalkoxy, alkoxyalkyl; R4 = halo, haloalkyl, alkylsulfonyl, alkylsulfonyloxy; n = 0, 1 or 2] are prepd. as **herbicides**.

IT **179824-80-7P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(intermediate in prepn. of herbicidal benzoyl bicycloalkanedione derivs.)

RN 179824-80-7 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 4-chloro-3-[2-chloro-3-methoxy-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



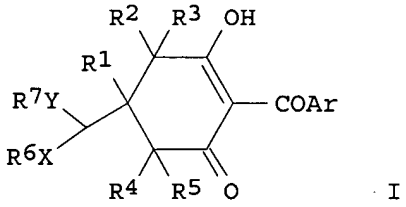
L7 ANSWER 94 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1996:349658 CAPLUS
DOCUMENT NUMBER: 125:10373
TITLE: Preparation of 1-aroylcyclohexane-1,3-dione derivatives as **herbicides** and **plant** growth regulators.
INVENTOR(S): Kast, Juergen; von Deyn, Wolfgang; Engel, Stefan; Kardorff, Uwe; Plath, Peter; Vossen, Marcus; Hill, Regina; Otten, Martina; Walter, Helmut; et al.
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: Ger. Offen., 26 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 4434987	A1	19960404	DE 1994-4434987	19940930
CA 2200497	AA	19960411	CA 1995-2200497	19950919
WO 9610561	A1	19960411	WO 1995-EP3685	19950919
W: AU, BG, BR, BY, CA, CN, CZ, FI, HU, JP, KR, KZ, MX, NO, NZ, PL, RU, SG, SK, UA, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
AU 9535689	A1	19960426	AU 1995-35689	19950919
EP 783487	A1	19970716	EP 1995-932774	19950919

EP 783487	B1	20000209			
R: AT, BE, CH, DE, ES, FR, GB, IT, LI, NL					
CN 1159800	A	19970917	CN 1995-195408	19950919	
BR 9509465	A	19971118	BR 1995-9465	19950919	
HU 77202	A2	19980302	HU 1997-1855	19950919	
JP 10506401	T2	19980623	JP 1995-511333	19950919	
AT 189675	E	20000215	AT 1995-932774	19950919	
US 6040274	A	20000321	US 1997-809100	19970318	
PRIORITY APPLN. INFO.:			DE 1994-4434987	19940930	
			WO 1995-EP3685	19950919	

OTHER SOURCE(S): MARPAT 125:10373

GI



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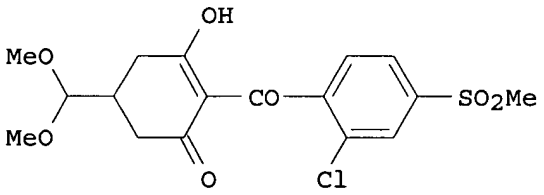


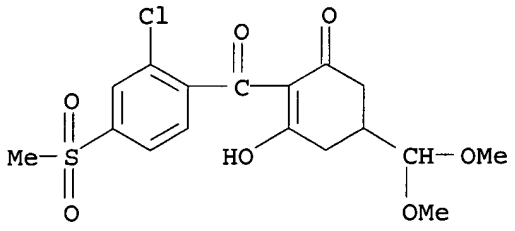
II

AB Title compds. [I; X, Y = O, S; Ar = (substituted) Ph, 5-6 membered heteroaryl; r1-R4 = H, alkyl; R5 = H, alkyl, alkoxycarbonyl; R6, R7 = alkyl, PhCH2; R6R7 = (alkyl-substituted) ethylene, propylene], were prepd. as **herbicides** and **plant** growth regulators (no data). Thus, 2-chloro-4-methylsulfonylbenzoyl chloride, 5-dimethoxymethyl-1,3-cyclohexanedione, and Et3N were stirred in THF at 0-20.degree. for 2 h to give 79% 5-dimethoxymethyl-3-oxo-1-cyclohexen-1-yl 2-chloro-4-methylsulfonylbenzoate, which in MeCN was treated with acetone cyanohydrin, Et3N, and aq. HCl to give title compd. (II).

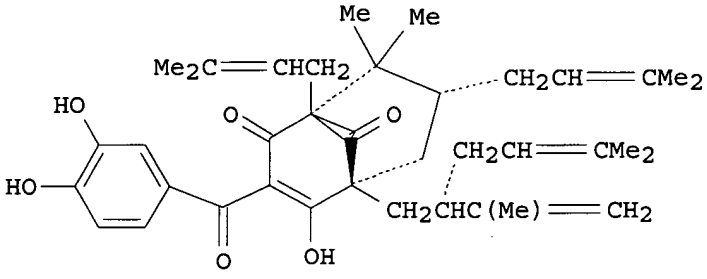
IT **177482-81-4P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 1-aroylcyclohexane-1,3-dione derivs. as **herbicides** and **plant** growth regulators)

RN 177482-81-4 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(methylsulfonyl)benzoyl]-5-(dimethoxymethyl)-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 95 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1996:127315 CAPLUS
DOCUMENT NUMBER: 124:226496
TITLE: Antibacterial activity of some Garcinia benzophenone derivatives against methicillin-resistant Staphylococcus aureus
AUTHOR(S): Iinuma, Munekazu; Tosa, Hideki; Tanaka, Toshiyuki; Kanamaru, Satiyo; Asai, Fujio; Kobayashi, Yasuko; Miyauchi, Ken-ichi; Shimano, Ryoyu
CORPORATE SOURCE: Dep. Pharmacognosy, Gifu Pharmaceutical Univ., Gifu, 502, Japan
SOURCE: Biological & Pharmaceutical Bulletin (1996), 19(2), 311-14
CODEN: BPBLEO; ISSN: 0918-6158
PUBLISHER: Pharmaceutical Society of Japan
DOCUMENT TYPE: Journal
LANGUAGE: English
GI



I

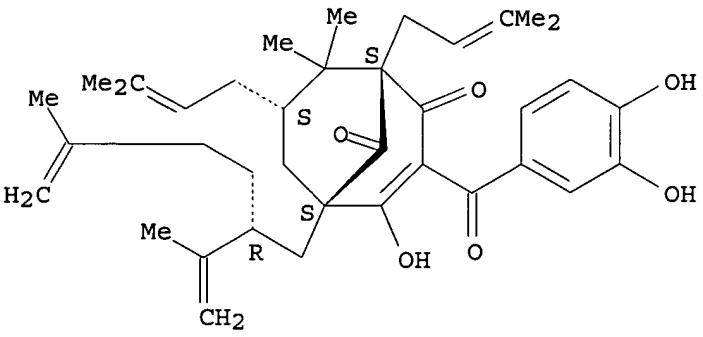
AB Benzophenone derivs., garcinol (I) and isogarcinol (II) isolated from the pericarps of Garcinia purpurea (Guttiferae), and xanthochymol (III) and a mixt. of isoxanthochymol, an enantiomer of II, and its regioisomer cycloxanthochymol from the pericarps of G. subelliptica were evaluated for their antibacterial activity against methicillin-resistant Staphylococcus aureus. Among them, III showed the lowest min. inhibitory concn. at 3.1-12.5 .mu.g/mL. This concn. is nearly equal to that of the antibiotic, vancomycin.

IT **52617-32-0P**, Xanthochymol
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); PUR (Purification or recovery); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(antibacterial activity of benzophenone derivs. from Garcinia against methicillin-resistant Staphylococcus aureus)

RN 52617-32-0 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2R)-5-methyl-2-(1-methylethenyl)-

5-hexenyl]-, (1S,5S,7S)- (9CI) (CA INDEX NAME)

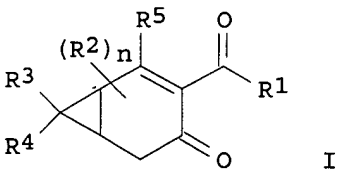
Absolute stereochemistry.



L7 ANSWER 96 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1995:978693 CAPLUS
DOCUMENT NUMBER: 124:8243
TITLE: Preparation of substituted bicycloheptanedione derivatives as **herbicides**
INVENTOR(S): Matsuhashi, Taisuke; Sugiura, Tadashi; Yanaka, Satoru; Adachi, Hiroyuki; Tomita, Kazuyuki; Takahashi, Akihiro; Kawana, Takashi
PATENT ASSIGNEE(S): Nippon Soda Co, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 45 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 07196585	A2	19950801	JP 1994-257528	19940927
PRIORITY APPLN. INFO.:			JP 1993-260442	19930927
			JP 1993-323260	19931129

OTHER SOURCE(S): MARPAT 124:8243
GI



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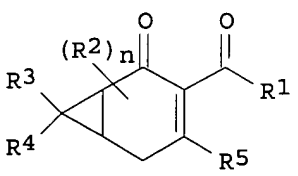

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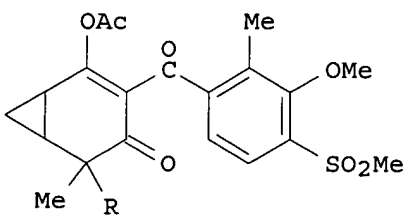


III

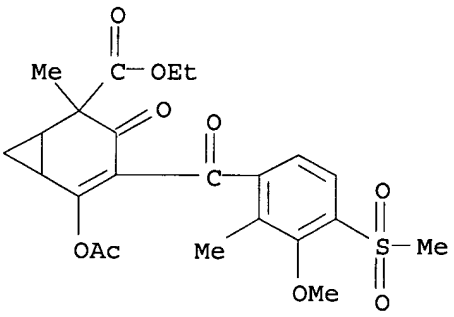
09/ 943,037

AB The title compds. [I and II; R1 = (un)substituted C1-6 alkyl, Ph, aralkyl, or heterocyclyl; R2 = halo, (un)substituted C1-6 alkoxy, alkylthio, alkylsulfinyl, alkylsulfonyl, alkyl, or alkoxycarbonyl, (un)substituted C1-6 alkoxy-C1-6 alkyl, cyano, C1-6 cyanoalkyl; n = 0-4; R3, R4 = H, C1-6 alkyl; R5 = halo, cyano, cyanato, thiocyanato, O2CR6, OSO2R7, OSO2NR8R9, OCO2R10, O2CNR11R12, etc.; wherein R6, R7 = (un)substituted C1-6 alkyl, C2-6 alkenyl, C3-8 cycloalkyl, or Ph; R8, R9 = H, (un)substituted C1-6 alkyl or Ph; R10 C1-6 alkyl, (un)substituted Ph; R11, R12 = H, C1-6 alkyl, (un)substituted Ph], which are safe and have potent and selective herbicidal activity, are prepd. Thus, 0.60 g 5-ethoxycarbonyl-3-(3-methoxy-2-methyl-4-methylsulfonylbenzoyl)-5-Me bicyclo[4.1.0]heptane-2,4-dione was dissolved in 6 mL CH2Cl2, followed by successively adding 0.15 mL Et3N and 0.12 g acetyl chloride under ice-cooling, and the resulting mixt. was stirred at room temp. for 3 h, after workup and silica gel chromatog., 51.7% benzoylbicycloheptanedione deriv. (III; R = CO2Et). III (R = H) at 25 g/10 are (postemergence foliar application) controlled 100% weeds (5-10 cm height) Digitaria ciliaris, Setaria Faberii, Abutilon theophrasti, Amaranthus Blitum, and Cyperus microiria and gave no damage to corn **plant** (.apprx.20 cm height).

IT **171351-54-5P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of alkanoyl-, heterocyclylcarbonyl-, and benzoylbicycloheptanedione derivs. as **herbicides**)

RN 171351-54-5 CAPLUS

CN Bicyclo[4.1.0]hept-4-ene-2-carboxylic acid, 5-(acetyloxy)-4-[3-methoxy-2-methyl-4-(methylsulfonyl)benzoyl]-2-methyl-3-oxo-, ethyl ester (9CI) (CA INDEX NAME)



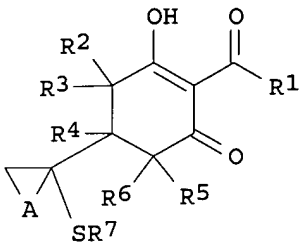
L7 ANSWER 97 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1995:957988 CAPLUS
DOCUMENT NUMBER: 124:8285
TITLE: Preparation of 2-aroylcyclohexanedione **herbicides**
INVENTOR(S): Kast, Juergen; Von, Deyn Wolfgang; Nuebling, Christoph; Walter, Helmut; Gerber, Matthias; Westphalen, Karl-Otto
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: Eur. Pat. Appl., 32 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

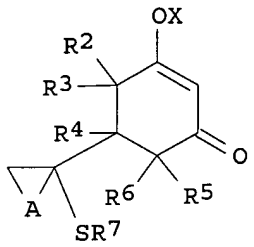
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE

EP 666254	A1	19950809	EP 1995-101123	19950127
EP 666254	B1	19990414		
R: BE, CH, DE, FR, GB, IT, LI, NL				
DE 4403670	A1	19950907	DE 1994-4403670	19940207
JP 08020573	A2	19960123	JP 1995-14360	19950131
CA 2141763	AA	19950808	CA 1995-2141763	19950203
US 5559218	A	19960924	US 1995-384155	19950206

PRIORITY APPLN. INFO.: DE 1994-4403670 19940207
OTHER SOURCE(S): CASREACT 124:8285; MARPAT 124:8285
GI



I

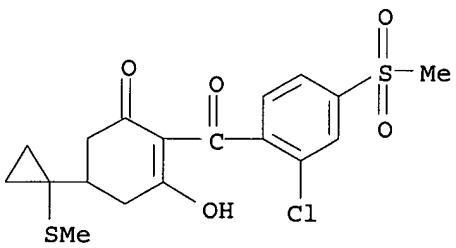


II

AB The title compds. [I; A = C1-6 alkylene; R1 = (un)substituted Ph or heteroaryl, etc.; R2-R5 = H, C1-4 alkyl; R6 = H, C1-4 alkyl, alkoxycarbonyl; R7 = C1-4 alkyl], useful as **herbicides**, are prepd. by the esterification of cyclohexenonol (II; X = H) with acid chlorides R1COCl, producing enol esters (II; X = COR1), which undergo rearrangement in the presence of cyanide bases (e.g., acetone cyanohydrin) to I. Thus, 3-(2-chloro-4-methylsulfonylbenzoyloxy)-5-(1-methylthiocyclopropyl)cyclohex-2-enone was dissolved in anhyd. MeCN and contacted with acetone cyanohydrin in the presence of Et3N, producing 2-(2-chloro-4-methylsulfonylbenzoyl)-5-(1-methylthiocyclopropyl)-1,3-cyclohexanedione, m.p. 148-152.degree..

IT **170992-65-1P**
RL: AGR (Agricultural use); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of 2-aroylcyclohexanedione **herbicides**)

RN 170992-65-1 CAPLUS
CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(methylsulfonyl)benzoyl]-3-hydroxy-5-[1-(methylthio)cyclopropyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 98 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER:	1994:557296 CAPLUS
DOCUMENT NUMBER:	121:157296
TITLE:	Benzoylcyclohexenone **herbicides**
INVENTOR(S):	Mueller, Stephan; Schuetze, Rainer; Bauer, Klaus; Bieringer, Hermann
PATENT ASSIGNEE(S):	Hoechst A.-G., Germany

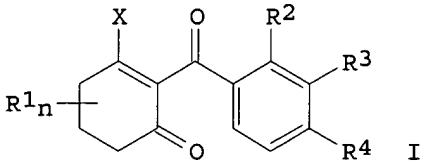
09/ 943,037

SOURCE: Ger. Offen., 30 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 4241999	A1	19940616	DE 1992-4241999	19921212
CA 2151498	AA	19940623	CA 1993-2151498	19931202
WO 9413619	A1	19940623	WO 1993-EP3385	19931202
W: AU, BB, BG, BR, CA, CZ, FI, HU, JP, KP, KR, KZ, LK, MG, MN, MW, NO, NZ, PL, RO, RU, SD, SK, UA, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
AU 9456949	A1	19940704	AU 1994-56949	19931202
EP 673359	A1	19950927	EP 1994-902660	19931202
R: DE, DK, ES, FR, GB, IT				
JP 08504414	T2	19960514	JP 1993-513740	19931202
BR 9307631	A	19990824	BR 1993-7631	19931202

PRIORITY APPLN. INFO.: DE 1992-4241999 A 19921212
WO 1993-EP3385 W 19931202

OTHER SOURCE(S): MARPAT 121:157296
GI



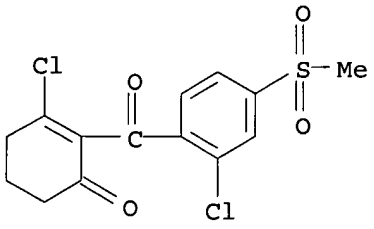
I

AB The title **herbicides** [I; R1 = C1-4 alkyl or C3-6 cycloalkyl, (un)substituted Ph; R2 = halogen, CN, NO2, C1-3 alkyl, C1-3 alkoxy, etc.; R3 = H, halogen, OH, C1-3 alkyl, C1-3 alkoxy, C1-3 haloalkyl, etc.; R4 = H, CN, NO2, halogen, etc.; X = halogen, CN, OCN, SCN, C2-4 alkynyl, etc.; n = 0-6], useful as **herbicides** and **plant**-growth regulators, are prepd. Thus, 2-(4-chloro-2-nitrobenzoyl)-1,3-cyclohexanedione was reacted with oxalyl bromide, producing I (R1 = R3 = H, R2 = NO2, R4 = Cl, X = Br), m.p. 139.degree., which demonstrated herbicidal activity.

IT **114911-84-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. and herbicidal activity of)

RN 114911-84-1 CAPLUS

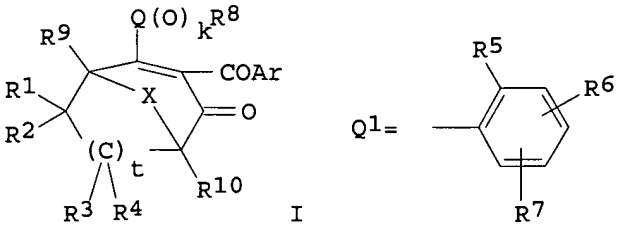
CN 2-Cyclohexen-1-one, 3-chloro-2-[2-chloro-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 99 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1994:533693 CAPLUS
DOCUMENT NUMBER: 121:133693
TITLE: Preparation of benzoylcycloalkenones as **herbicides**
INVENTOR(S): Komatsubara, Kenichi; Sato, Tadashi; Mikami, Kenji; Yamada, Juji; Sato, Makiko
PATENT ASSIGNEE(S): Sds Biotech Corp, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 27 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 06025144	A2	19940201	JP 1993-84063	19930318
CN 1105023	A	19950712	CN 1994-101552	19940108
CN 1041916	B	19990203		
US 5525580	A	19960611	US 1994-182895	19940114

PRIORITY APPLN. INFO.: JP 1992-91454 19920318
JP 1993-84063 19930318
OTHER SOURCE(S): MARPAT 121:133693
GI



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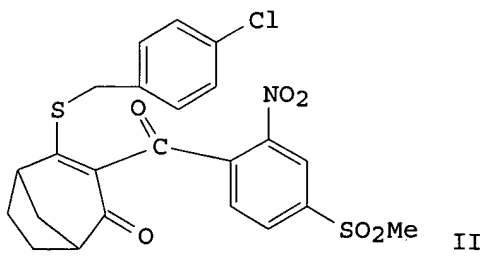


II

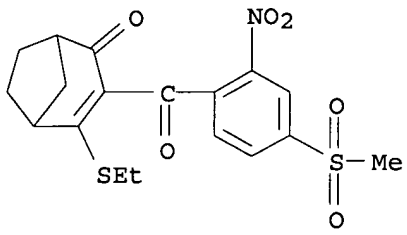
AB The title compds. I [X = O, alkylene, etc.; Q = S, etc.; R1 - R4, R9, R10 = H, alkyl, etc.; Ar = Q1, etc.; R5 = (substituted) alkyl, etc.; R6, R7 = H, or as given above for R5; further details on R6 and R7 are given; R8 =

alkyl, (substituted) Ph, etc.; k = 0 - 2; t = 1 or 2] are prepd. Title compd. II (prepn. given) at 500 g/ha gave 75% control of barnyard grass and 85% control of Scirpus juncoides. II at 1000 g/ha caused no damage to rice.

IT **156963-35-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 156963-35-8 CAPLUS

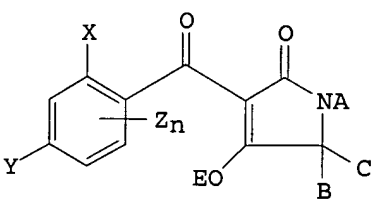
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(ethylthio)-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 100 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1994:270097 CAPLUS
DOCUMENT NUMBER: 120:270097
TITLE: Preparation of 3-benzoylpyrrolidine-2,4-diones as **insecticides** and **herbicides**
INVENTOR(S): Fischer, Reiner; Bretschneider, Thomas; Santel, Hans Joachim; Luerssen, Klaus; Schmidt, Robert Rudolf; Erdelen, Christoph
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: Ger. Offen., 33 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 4223015	A1	19940120	DE 1992-4223015	19920713
WO 9401401	A1	19940120	WO 1993-EP1690	19930630
W: AU, BR, BY, CA, CZ, HU, JP, KR, KZ, NZ, RU, SK, UA, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
AU 9345623	A1	19940131	AU 1993-45623	19930630

PRIORITY APPLN. INFO.: DE 1992-4223015 19920713
WO 1993-EP1690 19930630
OTHER SOURCE(S): MARPAT 120:270097
GI



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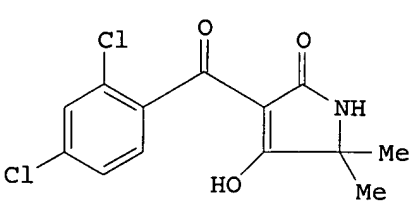


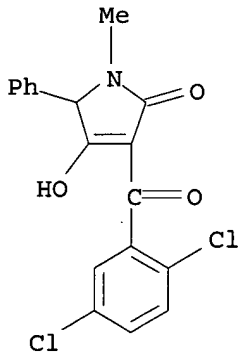
II

AB Title compds. [I; A = H, (halo)alkyl, alkenyl, Ph, etc.; B = H, (halo)alkyl, Ph, etc.; C = H, (halo)alkyl; AB, BC = atoms to form a ring; E = H, (halo)alk(en)yl, alkanoyl, etc.; X,Y = H, halo, (halo)alkyl, alkoxy, etc.; Z = halo, (halo)alkyl, alkoxy, etc.; n = 0-3] were prepd. as **insecticides** and **herbicides** (no data). Thus, 2,2-dimethyl-1H-pyrrolidin-3,5-dion was condensed with 2,4-Cl2C6H3COCl and the product treated with Me3C(OH)CN in MeCN contg. Et3N to give title compd. II.

IT **154548-97-7P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as **insecticide** and **herbicide**)

RN 154548-97-7 CAPLUS

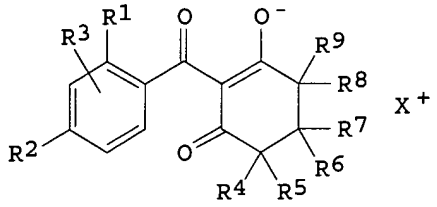
CN 2H-Pyrrol-2-one, 3-(2,5-dichlorobenzoyl)-1,5-dihydro-4-hydroxy-1-methyl-5-phenyl- (9CI) (CA INDEX NAME)



L7 ANSWER 101 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1994:134033 CAPLUS
DOCUMENT NUMBER: 120:134033
TITLE: Preparation of 2-benzoyl-1,3-cyclohexanedione salts as **herbicides**
INVENTOR(S): Ort, Oswald; Willms, Lothar; Bauer, Klaus; Bieringer, Hermann
PATENT ASSIGNEE(S): Hoechst A.-G., Georgia
SOURCE: Eur. Pat. Appl., 17 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 563817	A2	19931006	EP 1993-105014	19930326
EP 563817	A3	19931103		
R: DE, FR, GB, IT				
CN 1077449	A	19931020	CN 1993-103695	19930330
JP 06065135	A2	19940308	JP 1993-72288	19930330
CA 2093105	AA	19931001	CA 1993-2093105	19930331

PRIORITY APPLN. INFO.: DE 1992-4210583 19920331
OTHER SOURCE(S): MARPAT 120:134033
GI



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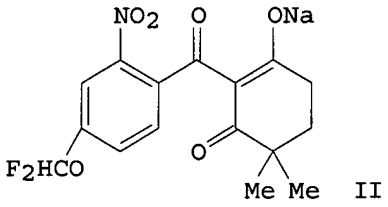


II

AB Title compds. [I; R1 = halo, (halo)alkyl, alkoxy, NO2, cyano, etc.; R2, R3 = H, groups cited for R1, etc.; R4-R9 = H, alkyl; R5 = H, alkyl, alkoxycarbonyl; X+ = metal cation, (substituted) ammonium ion, -phosphonium ion] were prepd. Thus, 2-(2-nitro-4-difluoromethoxybenzoyl)-4,4-dimethyl-1,3-cyclohexanedione was treated with NaOH to give title compd. II which gave 80-100% control of 6 weeds, e.g., Stelarid media, at 1.25 kg/ha preemergent.

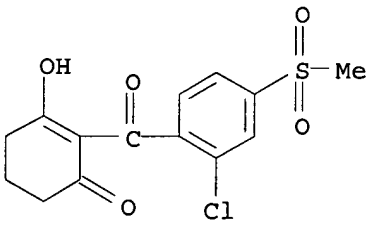
IT **152459-22-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 152459-22-8 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(methylsulfonyl)benzoyl]-3-hydroxy-, compd. with 2-propanamine (1:1) (9CI) (CA INDEX NAME)

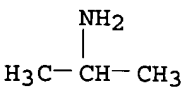
CM 1

CRN 129233-47-2
CMF C14 H13 Cl O5 S



CM 2

CRN 75-31-0
CMF C3 H9 N



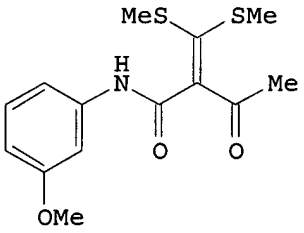
L7 ANSWER 102 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:517134 CAPLUS
DOCUMENT NUMBER: 119:117134
TITLE: 4-(Alkylthio)-2-quinolinones, 4-(alkylsulfinyl)-2-quinolinones and 314-(alkylamino)-2-quinolinones, a method for their preparation and their use as **fungicides** and **insecticides**

09/ 943,037

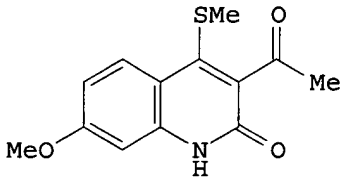
INVENTOR(S): Pak, Chwang Siek; Choi, Eun Bok; Yang, Huei Cheol; Yon, Gyu Hwan; Lee, Ge Hyeong; Lee, Hyeon Kyu; Kim, Sung Kee; Lee, Yeon Soo
PATENT ASSIGNEE(S): Korea Research Institute of Chemical Technology, S. Korea
SOURCE: PCT Int. Appl., 98 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9217452	A1	19921015	WO 1992-KR10	19920403
W: JP, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LU, MC, NL, SE				
EP 533882	A1	19930331	EP 1992-908080	19920403
EP 533882	B1	20010207		
R: DE, FR, GB, IT				
JP 05506461	T2	19930922	JP 1992-507521	19920403
JP 07072176	B4	19950802		
US 5430153	A	19950704	US 1993-952491	19930203

PRIORITY APPLN. INFO.: KR 1991-5391 A 19910403
KR 1991-5392 A 19910403
WO 1992-KR10 W 19920403
OTHER SOURCE(S): CASREACT 119:117134; MARPAT 119:117134
GI



I

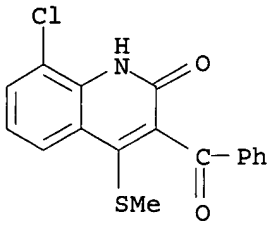


II

AB Some 4-(alkylthio)-2-quinolinone derivs. and 4-(alkylsulfinyl)-2-quinolinone derivs. or 4-(alkylamino)-2-quinolinone derivs. are claimed. These compds. are **fungicides** or **insecticides** and miticides (acaricides). Cyclocondensation of N-(3-methoxyphenyl)-.alpha.-[bis(methylthio)methylene]acetoacetamide (I) gave 3-acetyl-7-methoxy-4-(methylthio)-2-quinolinone (II) (82% yield).

IT **145499-01-0P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **fungicide** or **insecticide**)

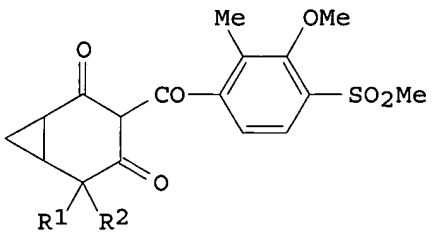
RN 145499-01-0 CAPLUS
CN 2(1H)-Quinolinone, 3-benzoyl-8-chloro-4-(methylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 103 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:488920 CAPLUS
DOCUMENT NUMBER: 119:88920
TITLE: Preparation of benzoylbicyclo[4.1.0]heptane-2,4-diones as **herbicides**.
INVENTOR(S): Adachi, Hiroyuki; Tanaka, Katsunori; Kawana, Takashi; Hosaka, Hideo
PATENT ASSIGNEE(S): Nippon Soda Co, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 12 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 3
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 05070426	A2	19930323	JP 1991-193595	19910709
US 5294598	A	19940315	US 1992-819150	19920109

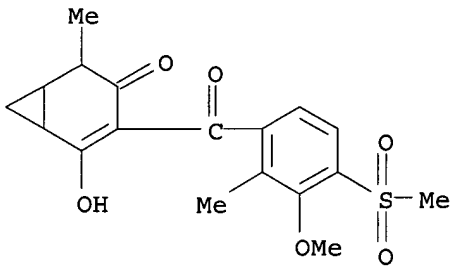
PRIORITY APPLN. INFO.: JP 1991-159689 19910604
US 1990-651266 19900629
JP 1991-193595 19910709
OTHER SOURCE(S): MARPAT 119:88920
GI



I

AB **Herbicides** contain benzoylbicyclo[4.1.0]heptane-2,4-diones I (R1 or R2 = Me; the other = H, lower alkoxycarbonyl) and/or their salts as active ingredients. 5-Ethoxycarbonyl-5-methylbicyclo[4.1.0]heptane-2,4-dione and 3-methoxy-2-methyl-4-methylsulfonylbenzoyl chloride were stirred with Et3N in CH2Cl2 at room temp. for 1 h, and the product was treated with Et3N and acetone cyanhydrin in MeCN at room temp. for 16 h to give 93.3% 3-(3-methoxy-2-methyl-4-methylsulfonylbenzoyl)-5-ethoxycarbonyl-5-methylbicyclo[4.1.0]heptane-2,4-dione(II). II (125 g/ha) totally controlled Digitaria ciliaris, Setaria faberi, Abutilon theophrasti, Amaranthus lividus, and Cyperus microiria, with no damage to corn. Concomitant application of 8 g/ha II and 125 g/ha atrazine showed synergistic herbicidal effect. A formulation example is given.
IT **149231-11-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except

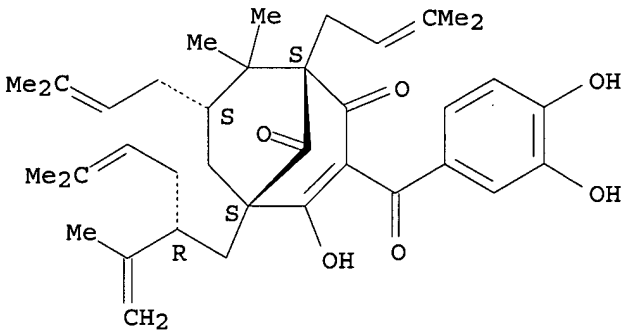
adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**, for corn)
RN 149231-11-8 CAPLUS
CN Bicyclo[4.1.0]hept-4-en-3-one, 5-hydroxy-4-[3-methoxy-2-methyl-4-(methylsulfonyl)benzoyl]-2-methyl-, sodium salt (9CI) (CA INDEX NAME)



● Na

L7 ANSWER 104 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:246973 CAPLUS
DOCUMENT NUMBER: 118:246973
TITLE: HIV inhibitory natural products. 8. The guttiferones, HIV-inhibitory benzophenones from Symphonia globulifera, Garcinia livingstonei, Garcinia ovalifolia and Clusia rosea
AUTHOR(S): Gustafson, Kirk R.; Blunt, John W.; Munro, Murray H. G.; Fuller, Richard W.; McKee, Tawnya C.; Cardellina, John H., II; McMahon, James B.; Cragg, Gordon M.; Boyd, Michael R.
CORPORATE SOURCE: Lab. Drug Discovery Res. Dev., Frederick Cancer Res. Dev. Cent., Frederick, MD, 21702-1201, USA
SOURCE: Tetrahedron (1992), 48(46), 10093-102
CODEN: TETRAB; ISSN: 0040-4020
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Exts. from species of the tropical **plant** genera Symphonia, Garcinia and Clusia (Guttiferae) have yielded a series of new polyisoprenylated benzophenone derivs. named guttiferones A-E. Structural assignments were based on detailed spectral analyses. These compds. inhibit the cytopathic effects of in vitro HIV infection.
IT **147782-04-5**, Guttiferone E
RL: BIOL (Biological study)
(HIV-inhibitory activity and structure of, from Garcinia ovalifolia)
RN 147782-04-5 CAPLUS
CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2R)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1S,5S,7S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

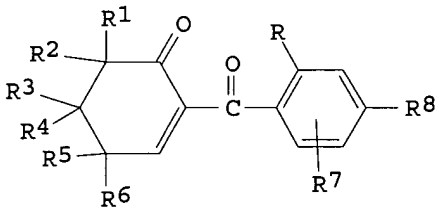


L7 ANSWER 105 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:101653 CAPLUS
DOCUMENT NUMBER: 118:101653
TITLE: Preparation of bis(2-benzoyl-3-oxocyclohexenylthio)alkanes as **herbicides**
INVENTOR(S): Knudsen, Christopher G.
PATENT ASSIGNEE(S): Imperial Chemical Industries PLC, UK
SOURCE: U.S., 9 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5152826	A	19921006	US 1991-778415	19911016

PRIORITY APPLN. INFO.: US 1991-778415 19911016
OTHER SOURCE(S): MARPAT 118:101653
GI

Q1=

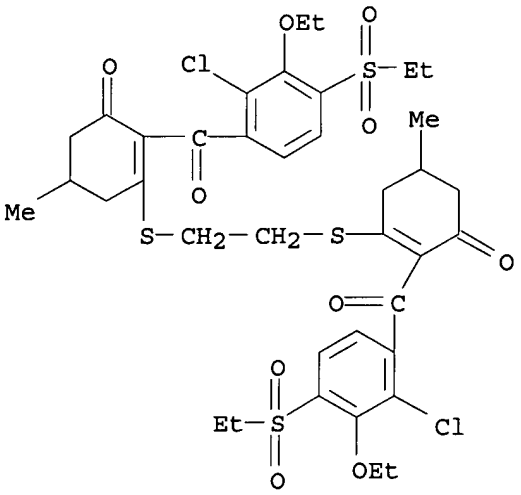


AB (QS)2Z [Q = benzoyloxocyclohexenyl group Q1; R = halo, (halo)alkyl, alkoxy, cyano, etc.; R1-R6 = H, alkyl; R1R2, R3R4 = O; R5R6 = alkylene; R7, R8 = H, halo, alkyl, alkoxy, etc.; Z = alkylene] were prepd. Thus, 2-(2-nitro-4-methanesulfonylbenzoyl)cyclohexane-1,3-dione was stirred with (COCl)2 and DMF in CH2Cl2 to give QCl (Q = Q1, R = NO2, R1 = R2 = Me, R3-R7 = H, R8 = SO2Me)(Q2) which was condensed with HSCH2CH2SH to give Q2SCH2CH2S2. The latter gave 80-100% control of 7 weeds, e.g. 95% control of Cyperus esculentus, at 4.0 kg/ha preemergent.

IT **145659-99-0**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)
(herbicidal activity of)

RN 145659-99-0 CAPLUS
CN 2-Cyclohexen-1-one, 3,3'-[1,2-ethanediylbis(thio)]bis[2-[2-chloro-3-ethoxy-

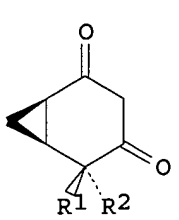
4-(ethylsulfonyl)benzoyl]-5-methyl- (9CI) (CA INDEX NAME)



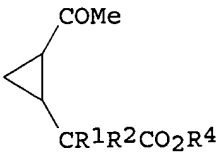
L7 ANSWER 106 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:21967 CAPLUS
DOCUMENT NUMBER: 118:21967
TITLE: Preparation of bicyclo[4.1.0]heptane-2,4-dione derivatives as intermediates for **herbicides**
INVENTOR(S): Suzuki, Junji; Hatano, Masami; Imaizumi, Shinichi
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: PCT Int. Appl., 15 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9213821	A1	19920820	WO 1992-JP84	19920129
W: US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LU, MC, NL, SE				
JP 04247052	A2	19920903	JP 1991-29202	19910131
EP 576673	A1	19940105	EP 1992-904250	19920129
EP 576673	B1	19960619		
R: CH, DE, FR, GB, LI				
US 5468905	A	19951121	US 1994-117158	19940525

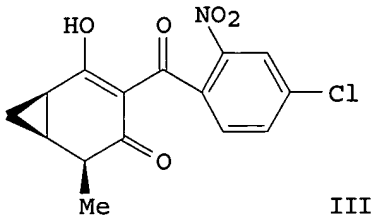
PRIORITY APPLN. INFO.: JP 1991-29202 19910131
WO 1992-JP84 19920129
OTHER SOURCE(S): CASREACT 118:21967; MARPAT 118:21967
GI



I



II



III

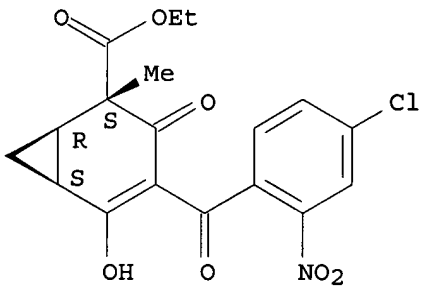
AB The title compds. (I; R1, R2 = H, alkyl, CO2R3; R3 = alkyl) are prepd. by reaction of XCH2CH:CHCOMe (X = halo) with R1R2CHCO2R4 (R1, R2 = same as above; R4 = alkyl) in the presence of a base to give a cyclopropane deriv. (II; R1, R2, R4 = same as above) followed by cyclization. Thus, 13.2 g MeCH(CO2Et)2 was added to a soln. of 5.15 g EtONa in EtOH followed by dropwise addn. of 9.5 g ClCH2CH:CHCOMe over 30 min and the mixt. was stirred at room temp. for 3 h to give after distn. 17.3 g trans-I (R1 = Me, R2 = CO2Et) which (331 g) was refluxed with 976 g 14.4% EtONa in EtOH to give 115 g trans-I (R1 = Me, R2 = CO2Et) and 8.1 g cis-I (R1 = CO2Et, R2 = Me). The trans isomer was converted into a **herbicide** (III) in 3 steps.

IT **144933-37-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and deethoxycarbonylation of)

RN 144933-37-9 CAPLUS

CN Bicyclo[4.1.0]hept-4-ene-2-carboxylic acid, 4-(4-chloro-2-nitrobenzoyl)-5-hydroxy-2-methyl-3-oxo-, ethyl ester, (1.alpha.,2.alpha.,6.alpha.)- (9CI) (CA INDEX NAME)

Relative stereochemistry.



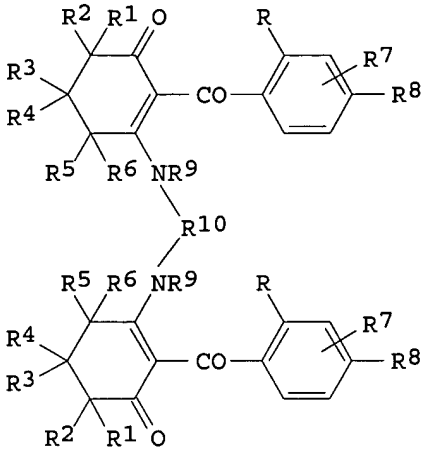
L7 ANSWER 107 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1992:633599 CAPLUS
DOCUMENT NUMBER: 117:233599
TITLE: Preparation of substituted bis(2-benzoyl-3-oxocyclohexenyl)diamines as **herbicides**
INVENTOR(S): Knudsen, Christopher G.
PATENT ASSIGNEE(S): USA
SOURCE: PCT Int. Appl., 31 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE

09/ 943,037

WO 9213833 A1 19920820 WO 1992-US548 19920123
W: HU, JP
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LU, MC, NL, SE
US 5173105 A 19921222 US 1991-650525 19910205
PRIORITY APPLN. INFO.: US 1991-650525 19910205
OTHER SOURCE(S): MARPAT 117:233599
GI



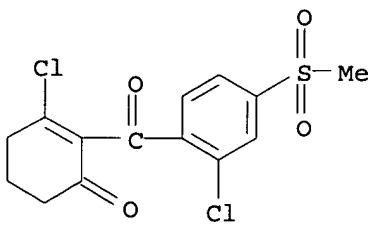
I

AB Title compds. I (R = halo, C1-2 alkyl, C1-2 alkoxy, O2N NC, C1-2 haloalkyl, RaSOn wherein Ra = C1-2 alkyl, n = 0, 2; R1-R6 = H, C1-4 alkyl, R1R2, R5R6 = C2-5 alkylene, R3R4 = O; R7, R8 = H, C1-4 alkyl, NC, O2N, halo, C1-4 alkoxy, F3CO, etc.; R9 = R1; R10 = C2-6 alkylene, C7-8 alkenylene, C4-8 alkylene, R7 is not at the 6-position) were prepd. 3-Chloro-2-(2-chloro-4-methanesulfonylbenzoyl)cyclohex-2-enone (prepn. given) in CH2Cl2 at room temp. was added to MeNHCH2CH2NHMe and Et3N in CH2Cl2 to give I (R = Cl, R1-R7 = H, R8 = MeSO2, R9 = Me, R10 = CH2CH2). A similar title compd. I (R = Cl, R1 = R2 = R4-R6 = H, R3 = R9 = Me, R7 = 3-EtO, R8 = EtSO2, R10 = CH2CH2) applied pre-emergence at 0.17 kg/ha controlled 100% gradient foxtail, green foxtail, broadleaf signalgrass, etc.

IT **114911-84-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. and condensation with dimethylethylenediamine)

RN 114911-84-1 CAPLUS

CN 2-Cyclohexen-1-one, 3-chloro-2-[2-chloro-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 108 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1992:511257 CAPLUS
DOCUMENT NUMBER: 117:111257
TITLE: Preparation of 2-aroyl-1,3-cyclohoxanediones as

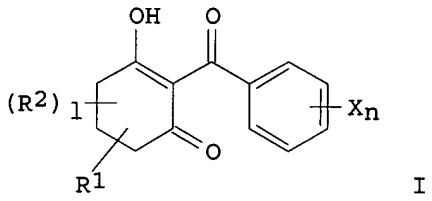
09/ 943,037

herbicides

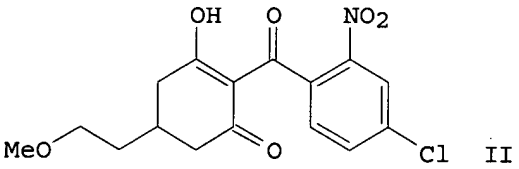
INVENTOR(S): Ueda, Akiyoshi; Ohishi, Haruhito; Aihara, Toshio; Ishikawa, Hisao; Tomida, Kazuyuki; Hosaka, Hideo
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: U.S., 7 pp. Cont.-in-part of U.S. Ser. No. 274,306, abandoned.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5110343	A	19920505	US 1990-527885	19900524
PRIORITY APPLN. INFO.:			JP 1987-301304	19871128
			US 1988-274306	19881121

OTHER SOURCE(S): MARPAT 117:111257
GI



I



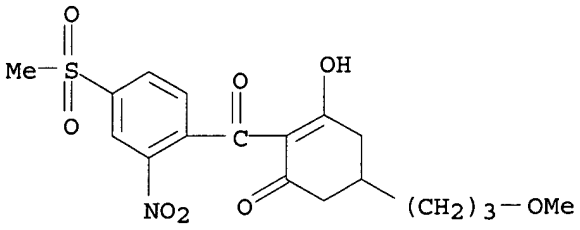
II

AB Title compds. [I; X = halo, NO2, (halo)alkyl, alkoxy, alkylthio, alkylsulfonyl; R1 = cyanoalkyl, haloalkyl, hydroxyalkyl, alkoxyalkyl, alkylthioalkyl, alkylsulfenylalkenyl, tetrahydropyranyloxyalkyl, alkylthio, PhS, pyridiyl, tetrahydropyranyl; R2 = alkyl; l = 0-2; n = 1-4], were prepd. Thus, 5-methoxyethylcyclohexane-2,3-dione and 2-nitro-4-chlorobenzoyl chloride in CH2Cl2 was treated with Et3N with ice cooling followed by stirring for 3 h at room temp. to give an enol ester which was isomerized with Et3N/KCN/18-crown-6 to give title compd. II. II at 10 g/are gave preemergent 100% control of arrowhead.

IT **123095-85-2P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 123095-85-2 CAPLUS

CN 2-Cyclohexen-1-one, 3-hydroxy-5-(3-methoxypropyl)-2-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)

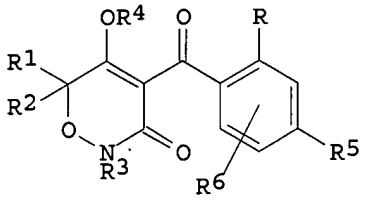


L7 ANSWER 109 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1992:469872 CAPLUS
DOCUMENT NUMBER: 117:69872
TITLE: Preparation of benzoyloxazinones as agrochemicals
INVENTOR(S): Lee, Shy Fuh
PATENT ASSIGNEE(S): Sandoz-Erfindungen Verwaltungsgesellschaft m.b.H., Austria; Sandoz-Patent-G.m.b.H.; Sandoz Ltd.
SOURCE: PCT Int. Appl., 13 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

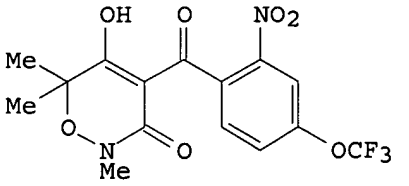
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9207837	A1	19920514	WO 1991-EP2014	19911023
W: AU, BR, CA, CS, HU, JP, KR, PL, SU				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LU, NL, SE				
CA 2072134	AA	19920426	CA 1991-2072134	19911023
AU 9187442	A1	19920526	AU 1991-87442	19911023
AU 642052	B2	19931007		
EP 506907	A1	19921007	EP 1991-918021	19911023
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE				
HU 61534	A2	19930128	HU 1992-2107	19911023
BR 9106194	A	19930323	BR 1991-6194	19911023
JP 05503106	T2	19930527	JP 1991-517054	19911023
ZA 9108535	A	19930426	ZA 1991-8535	19911025
US 5336662	A	19940809	US 1992-994048	19921214
US 5565410	A	19961015	US 1994-232919	19940425
US 5780626	A	19980714	US 1995-451279	19950526
US 5728831	A	19980317	US 1996-660969	19960612

PRIORITY APPLN. INFO.:
US 1990-604708 A 19901025
US 1989-343093 B2 19890425
US 1990-497154 B2 19900320
WO 1991-EP2014 A 19911023
US 1992-902609 B1 19920623
US 1992-994048 A3 19921214
US 1994-232919 A1 19940425

OTHER SOURCE(S): MARPAT 117:69872
GI



I



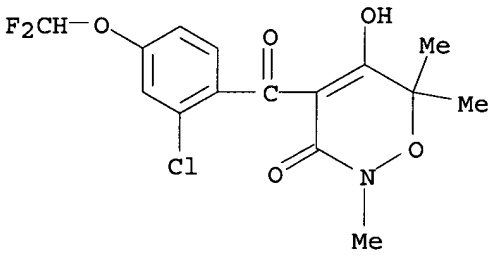
II

AB Title compds. [I; R1-R3 = H, alkyl, CO2H, alkoxycarbonyl, (substituted) Ph; R1R2 = C3-6 alkylene; R4 = H, alkyl, alkylcarbonyl, alkoxycarbonyl, CONR7R8, alkylsulfonyl, P(O)(OR9)2, PhCO, cation, etc.; R = (substituted) alkyl, alkoxy, alkylcarbonyl, alkoxycarbonyl, NR7R8, halo, cyano, NO2, etc.; R5 = haloalkoxy; R6 = H, R; R7, R8 = H, alkyl; R9 = alkyl], were prepd. as **herbicides**, acaricides, and **plant** growth regulators (no data). Thus, 2-nitro-4-trifluoromethoxyaniline was diazotized and cyanated with KCN in the presence of CuSO4 to give 2-nitro-4-trifluoromethoxybenzonitrile. The latter was hydrolyzed with aq. H2SO4 to the free acid, which was converted to the acid chloride. This was coupled with 2,6,6-trimethyl-2H-1,2-oxazine-3,5-(4H,6H)dione in the presence of Et3N and the product was stirred with acetone cyanohydrin in MeCN/Et3N to give title compd. II.

IT **142494-55-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as agrochem.)

RN 142494-55-1 CAPLUS

CN 2H-1,2-Oxazin-3(6H)-one, 4-[2-chloro-4-(difluoromethoxy)benzoyl]-5-hydroxy-2,6,6-trimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 110 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1992:426342 CAPLUS

DOCUMENT NUMBER: 117:26342

TITLE: Aryl and heteroaryl diones

INVENTOR(S): Les, Shy Fuh; Anderson, Richard J.; Luehr, Gary W.; Craig, G. Wayne; Kirkpatrick, Joel L.; Nishizaka, Takashi; Komatsubara, Kenichi

PATENT ASSIGNEE(S): Sandoz Ltd., Switz.

SOURCE: U.S., 13 pp. Cont.-in-part of U.S. Ser. No. 177,192, abandoned.
CODEN: USXXAM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 2

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5089046	A	19920218	US 1989-416173	19891002

HU 49873	A2	19891128	HU 1989-1389	19890322
HU 202851	B	19910429		
AU 8932382	A1	19891005	AU 1989-32382	19890403
AU 619533	B2	19920130		
DK 8901603	A	19891005	DK 1989-1603	19890403
CN 1037338	A	19891122	CN 1989-103206	19890403
JP 02006426	A2	19900110	JP 1989-84630	19890403
PL 158213	B1	19920831	PL 1989-278619	19890403
SU 1760982	A3	19920907	SU 1989-4613903	19890403
BR 8901581	A	19891121	BR 1989-1581	19890404
ZA 8902473	A	19901228	ZA 1989-2473	19890404

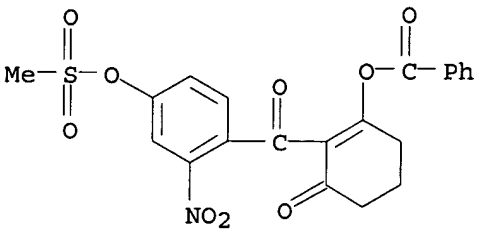
PRIORITY APPLN. INFO.: US 1988-177192 19880404
OTHER SOURCE(S): CASREACT 117:26342; MARPAT 117:26342
GI

* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB Title compds. I [one of X1, X2 represents CR1'R2' and the other represents R3(C)qR4; R1, R1', R2, R2', R3, and R4 = H, C1-8-alkyl, C1-8-alkoxy, C1-8-alkylthio, CO2R16, R4 may also be OH; R5 = C1-8-alkyl optionally substituted with 1 to 6 halogen atoms, C1-8-alkoxy optionally substituted with 1 to 6 halogen atoms, (O)nS(O)n'R12, NR15SO2R12, halo, CN. nitro; R6, R7 = H or selected from the values of R5 with the proviso that at least one of R5, R6 and R7 = OSO2R12 or NR15SO2R12; R8 = H or salt forming moiety; R12 = C1-8-alkyl optionally substituted with 1 to 6 halogen atoms or Ph optionally substituted with 1 to 3 members selected from C1-8-alkyl, C1-8-alkylcarbonyl, C1-8-alkoxycarbonyl, C1-8-alkylsulfonyl CONR13R14, P(O)(OR11'')2, and R13P(O)OR11''; R11, R11'', R13, R14, R15 and R16 = H or C1-8-alkyl; n = 0, 1; n' = 0, 1, 2; q = 0, 1] were prepd. as **herbicides**. Thus, benzoic acid II was treated with SOCl2 to give the acid chloride, which was treated with pyran III to give 2H-pyran-3-one IV. IV was treated with acetone cyanohydrin and Et3N in MeCN at room temp. to give 2H-pyran-3,5(4H,6H)-dione V. Preemergent and postemergent herbicidal activities are given for some of the prepd. compds.

IT **138137-50-5P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(prepn. and herbicidal activity of)

RN 138137-50-5 CAPLUS
CN 2-Cyclohexen-1-one, 3-(benzoyloxy)-2-[4-[(methylsulfonyl)oxy]-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



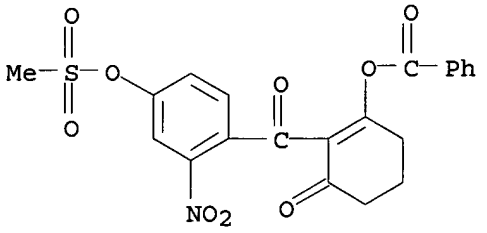
L7 ANSWER 111 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1992:41304 CAPLUS
DOCUMENT NUMBER: 116:41304
TITLE: Preparation of pyrandione derivatives as rice paddy **herbicides**

09/ 943,037

INVENTOR(S): Nishisaka, Takashi; Komatsubara, Kenichi
PATENT ASSIGNEE(S): Sandoz A.-G., Switz.
SOURCE: Jpn. Kokai Tokkyo Koho, 14 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 03120202	A2	19910522	JP 1989-258644	19891003

PRIORITY APPLN. INFO.: JP 1989-258644 19891003
OTHER SOURCE(S): MARPAT 116:41304
GI For diagram(s), see printed CA Issue.
AB Pyrandione derivs. [I; R1-R4 = H, C1-6 alkyl; R5 = halo, C1-8 alkyl, alkoxy, NO2, etc.; R6, R7 = any group defined by R5, alkylsulfonyloxy, etc.; X = O, CH2] are prepd. Et3N and acetone cyanohydrin were added to a soln. of ester II in MeCN with stirring at room temp. to give pyrandione compd. III. Also prepd. were 58 addnl. I, some of which killed 85% barnyard grass and 90% flat sedge, etc. at 63 g/ha without any harm to rice **plants**.
IT **138137-50-5P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)
RN 138137-50-5 CAPLUS
CN 2-Cyclohexen-1-one, 3-(benzoyloxy)-2-[4-[(methylsulfonyl)oxy]-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



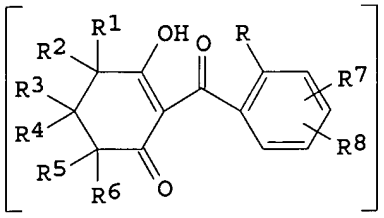
L7 ANSWER 112 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1991:650370 CAPLUS
DOCUMENT NUMBER: 115:250370
TITLE: Preparation of benzoylcyclohexenones as selective **herbicides** for paddy.
INVENTOR(S): Komatsubara, Kenichi; Nishisaka, Takashi; Mikami, Kenji; Sato, Tadashi
PATENT ASSIGNEE(S): SDS Biotech K. K., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 03063248	A2	19910319	JP 1989-196613	19890731

PRIORITY APPLN. INFO.: JP 1989-196613 19890731
OTHER SOURCE(S): MARPAT 115:250370

09/ 943,037

GI



@ $NR^9R^{10}R^{11}$

I

AB Selective **herbicides** for paddy contain the title compds. I [R = halo, C1-2 (halo)alkyl or alkoxy, NO2, cyano, R12SOm; R1-6 = H, C1-4 alkyl; R1R2, R5R6 = C2-5 alkylene; R3R4 = O; R7, R8 = H, halo, C1-4 (halo)alkyl, alkoxy, CF3, cyano, NO2, R13SOn, (di)(C1-4 alkyl)amino, C2-5 acyl, alkoxycarbonyl, (di)(C1-4 alkyl)sulfamoyl, (di)(C1-4 alkyl)amido; R9-11 = H, C1-16 (hydroxy)alkyl, C1-4 alkenyl; R9R10 = (O-contg.) alkylene; R12 = C1-2 alkyl; R13 = C1-4 haloalkyl or cyanoalkyl, Ph, benzyl; m = 0, 2; n = 0, 1, 2] as active ingredients. A soln. of 4-chloro-2-nitrobenzoyl chloride and 1,3-cyclohexanedione in CH2Cl2 was treated with NEt3 at room temp. for 1 h to give 2-(4'-chloro-2'-nitrobenzoyl)-1,3-cyclohexanedione (II), which was stirred with NEt3 in CH2Cl2 at room temp. for 30 min to afford I (R = NO2, R1-6 = R8 = H, R7 = 4-Cl, R9-11 = Et) (III). Granules contg. III were applied to irrigation water of a paddy, at 63 g/ha, to exhibit 85-95% control of Echinochloa crus-galli, Scirpus juncoides, Cyperus serotinus, and 5 other weeds, without damage on rice, while II gave some damage on rice.

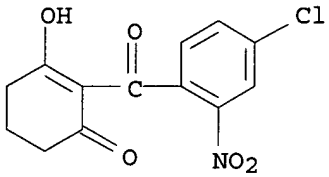
IT **136208-03-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as selective **herbicide**, for paddy)

RN 136208-03-2 CAPLUS

CN 2-Cyclohexen-1-one, 2-(4-chloro-2-nitrobenzoyl)-3-hydroxy-, compd. with N,N-diethylethanamine (1:1) (9CI) (CA INDEX NAME)

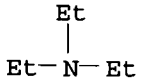
CM 1

CRN 136208-02-1
CMF C13 H10 Cl N O5



CM 2

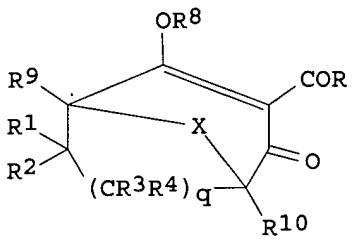
CRN 121-44-8
CMF C6 H15 N



L7 ANSWER 113 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1991:632081 CAPLUS
DOCUMENT NUMBER: 115:232081
TITLE: Preparation of pyrandione derivatives as rice paddy **herbicides**
INVENTOR(S): Nishisaka, Takashi; Komatsubara, Kenichi; Shaiifuu, Rii
PATENT ASSIGNEE(S): Sandoz A.-G., Switz.
SOURCE: Jpn. Kokai Tokkyo Koho, 12 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 03120203	A2	19910522	JP 1989-258645	19891003

PRIORITY APPLN. INFO.: JP 1989-258645 19891003
OTHER SOURCE(S): MARPAT 115:232081
GI



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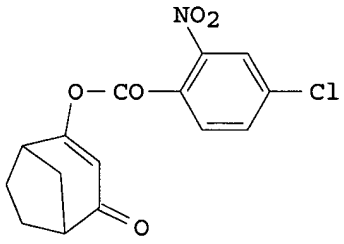
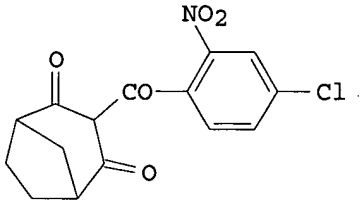


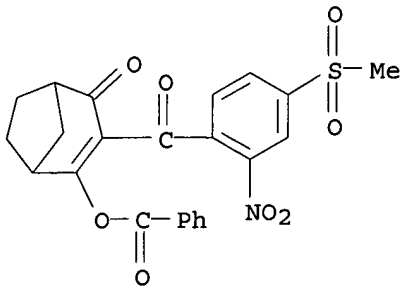
II



III

AB Pyrandione derivs. [I; R = (substituted) Ph, pyrimidinyl; R1-R4, R9, R10 = H, C1-8 alkyl, CO2H, alkoxycarbonyl; R8 = H, C1-8 alkyl, alkylcarbonyl, etc.; X = O, CH2; q = O, 1, 2] are prepd. Et3N and acetone cyanohydrin were added to a soln. of ester II in MeCN with stirring at room temp. to give dione III. Among 31 addnl. I prepd., one showed 85% control of barnyard grass and 95% flat sedge at 63 g/ha without any harm to rice **plants**.

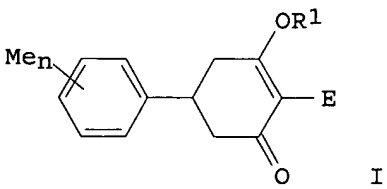
IT **137014-60-9P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)
RN 137014-60-9 CAPLUS
CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(benzoyloxy)-3-[4-(methylsulfonyl)-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 114 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1991:535693 CAPLUS
DOCUMENT NUMBER: 115:135693
TITLE: Preparation of 5-phenyl-cyclohexane-1, 3-dione derivatives as **herbicides**
INVENTOR(S): Warner, Richard B.; Serban, Alexander; Watson, Keith G.; Bird, Graham J.; Cross, Lindsay E.; Farquharson, Graeme J.
PATENT ASSIGNEE(S): ICI Australia Ltd., Australia
SOURCE: Can., 97 pp. Division of Can. 1,203,543.
CODEN: CAXXA4
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
CA 1280768	A2	19910226	CA 1986-499854	19860117
AU 8290459	A1	19830526	AU 1982-90459	19811120
AU 555882	B2	19861016		
ZA 8207945	A	19830831	ZA 1982-7945	19821029
CA 1203543	A1	19860422	CA 1982-415996	19821119
US 4760192	A	19880726	US 1986-947366	19861229

PRIORITY APPLN. INFO.: AU 1981-1635 19811120
AU 1982-4137 19820525
CA 1982-415996 19821119
US 1982-440592 19821110
OTHER SOURCE(S): MARPAT 115:135693
GI



I

AB The title compds. [I; E = C(:NOR2)R3; R1 = H, (un)substituted C1-6 alkyl, C2-6 alkenyl, C2-6 alkynyl, (un)substituted PhSO2, acyl, (in)org. cation; R2 = (un)substituted C1-6 alkyl, C2-6 (halo)alkenyl or (halo)alkynyl; R3 = C1-6 (fluoro)alkyl, C2-6 alkenyl or alkynyl, Ph; n = 2-5] are prepd. via intermediates I [E = H, C(O)R3]. Thus, a mixt. of 61 mmol 1-(2,4,6-trimethylphenyl)but-1-en-3-one in EtOH was added to a reaction mixt. of 60 mmol CH2(CO2Et)2 and Na in EtOH over 2 min and after refluxing

the mixt. for 2 h, an aq. soln. of 180 mmol NaOH was added and then the mixt. was further refluxed for 4.5 h to give I (E = R1 = H, Men = 2,4,6-Me3). This was refluxed with (EtCO)2O in the presence of NaOMe to give I (E = EtCO, R1 = H, Me2 = 2,4,6-Me3) which was stirred with EtONH2.HCl aq. 1% NaOH/EtOH at room temp. for 4 h to give I [E = C(:NHOMe)Et, R1 = H, Men = 2,4,6-Me3] (II). II at 0.04 kg/ha post-emergently controlled 80-100% 3 weeds, e.g. Alopecurus myosuroides withe no damage to winter wheat and spring barley. A total of 95 I were prepd. and tested for the herbicidal activity.

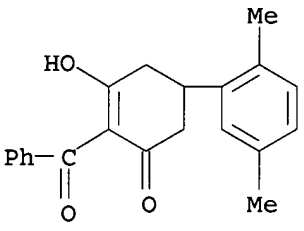
IT **135906-57-9P**

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(prepn. and reaction of, in prepn. of phenylcyclohexanedione **herbicide**)

RN 135906-57-9 CAPLUS

CN 2-Cyclohexen-1-one, 2-benzoyl-5-(2,5-dimethylphenyl)-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 115 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1991:508565 CAPLUS

DOCUMENT NUMBER: 115:108565

TITLE: Preparation of 2-benzoylcyclohex-2-enones as selective **herbicides** for paddy.

INVENTOR(S): Komatsubara, Kenichi; Nishisaka, Takashi; Mikami, Kenji; Sato, Tadashi

PATENT ASSIGNEE(S): SDS Biotech K. K., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.
CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

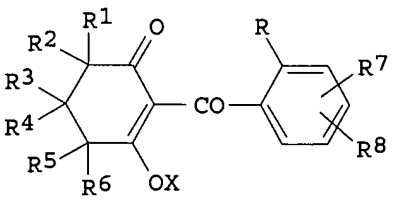
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 03005408	A2	19910111	JP 1989-139091	19890602

PRIORITY APPLN. INFO.: JP 1989-139091 19890602

OTHER SOURCE(S): MARPAT 115:108565

GI



I

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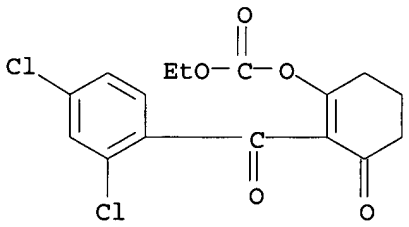
AB Selective **herbicides** for paddy fields contain title compds. I [R = halo, C1-2 (halo)alkyl, MeO, EtO, NO2, cyano, MeSOm, EtSOm; R1-R6 = H, C1-4 alkyl; R1R2 and/or R5R6 = C2-5 alkylene; R3R4 = O; R7, R8 = H, halo, C1-4 (halo)alkyl, C1-4 alkoxy, CF3, cyano, NO2, R9SOn, NR10R11, R12CO, SO2NR10R11, NR10COR11; X = (un)substituted R13CO, (un)substituted Bz; R9 = C1-4 haloalkyl, cyanoalkyl, Ph, PhCH2; R10, R11 = H, C1-4 alkyl; R12 = C1-4 alkyl or alkoxy; R13 = C1-8 alkyl or alkoxy; m = 0, 2; n = 0-2] as active ingredients. Treatment of 4-chloro-2-nitrobenzoyl chloride with 1,3-cyclohexanedione and Et3N in CH2Cl2 at room temp. for 1 h and treatment of the resulting product with acetone cyanohydrin and Et3N in MeCN at room temp. for 1 h gave 66% I (R = NO2, R1 -R6 = R8 = X = H, R7 = 4-Cl) (II), which was treated with BzCl and Et3N in CH2Cl2 at room temp. for 2 h to afford 42% I (R = NO2, R1 -R6 = R8 = H, R7 = 4-Cl, X = Bz) (III). III, at 63 g/ha, showed almost complete control of Panicum crus-galli, Scirpus juncoides, Cyperus serotinus, Eleocharis kuroguwai, Ammannia multiflora, Monochoria vaginalis, Sagittaria pygmaea, and Sagittaria trifolia without damaging rice, vs. less effect, with rice damage, for II. III 50, diatomaceous earth 20, clay 22, white C 3, Na ligninsulfonate 2, and Na alkylnaphthalenesulfonate 3 parts were mixed to give a wettable powder.

IT **135745-39-0**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study); USES (Uses)
(**herbicide**, for rice)

RN 135745-39-0 CAPLUS

CN Carbonic acid, 2-(2,4-dichlorobenzoyl)-3-oxo-1-cyclohexen-1-yl ethyl ester (9CI) (CA INDEX NAME)



L7 ANSWER 116 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1991:470985 CAPLUS
DOCUMENT NUMBER: 115:70985
TITLE: Cyclohexenone compounds, process for their preparation and their use as **herbicides** or **plant** growth regulators
INVENTOR(S): Kast, Juergen; Meyer, Norbert; Misslitz, Ulf; Schubert, Juergen; Jung, Johann; Rademacher, Wilhelm; Westphalen, Karl Otto; Wuerzer, Bruno
PATENT ASSIGNEE(S): BASF A.-G., Germany
SOURCE: Eur. Pat. Appl., 23 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 422537	A1	19910417	EP 1990-119208	19901006
EP 422537	B1	19940511		

R: AT, BE, CH, DE, ES, FR, GB, IT, LI, NL

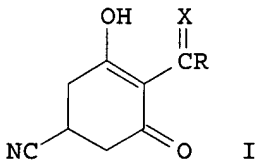
09/ 943,037

DE 3934204	A1	19910418	DE 1989-3934204	19891013
AT 105548	E	19940515	AT 1990-119208	19901006
ES 2054190	T3	19940801	ES 1990-119208	19901006
US 5085689	A	19920204	US 1990-594949	19901010
CA 2027446	AA	19910414	CA 1990-2027446	19901012
CA 2027446	C	20021008		
JP 03133948	A2	19910607	JP 1990-272480	19901012

PRIORITY APPLN. INFO.: DE 1989-3934204 A 19891013
EP 1990-119208 A 19901006

OTHER SOURCE(S): MARPAT 115:70985

GI



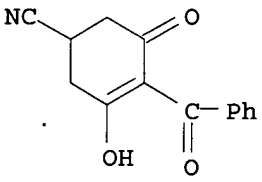
I

AB 5-Cyano-3-hydroxy-2-cyclohexen-1-ones I (R = alkyl, alkenyl, alkynyl, Ph, etc.; X = O, alkoxyimino, alkenyloxyimino, NH, alkylimino, NPh, etc.) were prepd. Thus, 5-formyl-2-propionyl-1,3-cyclohexanedione reacted with H2NOSO3H in H2O to give 71% I (R = Et, X = O), which inhibited the growth of barley and wheat more effectively than (2-chloroethyl)trimethylammonium chloride.

IT **134562-04-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of)

RN 134562-04-2 CAPLUS

CN 3-Cyclohexene-1-carbonitrile, 4-benzoyl-3-hydroxy-5-oxo- (9CI) (CA INDEX NAME)



L7 ANSWER 117 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1991:247031 CAPLUS

DOCUMENT NUMBER: 114:247031

TITLE: Synthesis of 1-(2,6-dihydroxyphenyl)-1-alkanones and -benzophenone by aromatization of 2-acyl-3-hydroxy-2-cyclohexen-1-ones with mercuric acetate

AUTHOR(S): Oliver, James E.; Wilzer, Kenneth R.; Waters, Rolland M.

CORPORATE SOURCE: Agric. Res. Cent., ARS, Beltsville, MD, 20705, USA

SOURCE: Synthesis (1990), (12), 1117-19
CODEN: SYNTBF; ISSN: 0039-7881

DOCUMENT TYPE: Journal

LANGUAGE: English

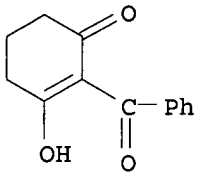
OTHER SOURCE(S): CASREACT 114:247031

AB 1-(2,6-Dihydroxyphenyl)-1-alkanones, i.e., 2,6-(HO)2C6H3COR [R = n-C11H23, n-C13H27, (CH2)7CH2Ph, (CH2)9CH2Ph, Ph], natural products identified from insects and from medicinal **plants**, are readily prepd. from 1,3-cyclohexanedione and appropriate carboxylic acids. The final step

involves aromatization using mercuric acetate.

IT **61834-43-3P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and aromatization of, with mercuric acetate)

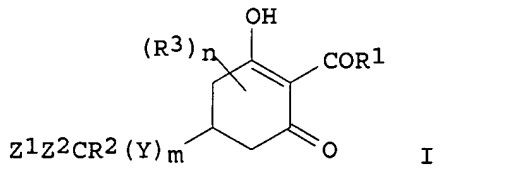
RN 61834-43-3 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 118 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1991:206633 CAPLUS
DOCUMENT NUMBER: 114:206633
TITLE: Preparation of substituted cyclohexanedione derivative as **herbicides**
INVENTOR(S): Ueda, Akiyoshi; Suga, Shigemi; Miyazawa, Yasuyuki; Aihara, Toshio; Tomida, Kazuyuki
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: PCT Int. Appl., 61 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9101289	A1	19910207	WO 1990-JP896	19900712
W: US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, IT, LU, NL, SE				
JP 03048635	A2	19910301	JP 1989-182258	19890714

PRIORITY APPLN. INFO.: JP 1989-182258 19890714
OTHER SOURCE(S): MARPAT 114:206633
GI



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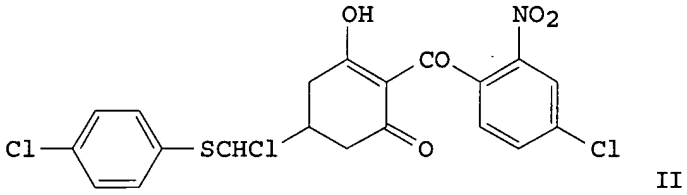
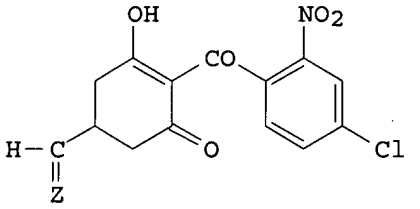


II



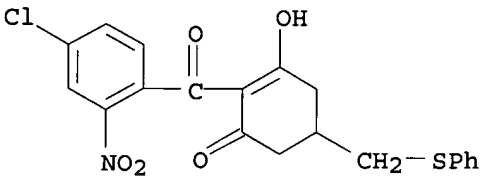
III

AB The title compds. [I; R1 = alkyl, (substituted) Ph, aralkyl, heterocyclyl; R2 = H, alkyl; R3 = halo, cyano, alkyl, haloalkyl, (substituted) Ph, etc.; Z1 = halo, alkoxy, alkylthio, (substituted) PhO, PhS, etc.; Z2 = (substituted) PhS, heterocyclylthio, alkoxy, etc.; Z1Z2 = O, alkylenedioxy, (substituted) imino, alkylene, etc.; m = 0, 1; n = 0-5; Y = alkylene] are prepd. Hydrolysis of sulfide II (prepn. given) with K2CO3 in 50% aq. Me2CO gave 74.2% aldehyde III (Z = O), which was treated with H2NOEt in CH2Cl2 at room temp. to give 95% oxime deriv. III (Z = EtON) (IV). IV showed complete kill of crabgrass, foxtail, Indian mallow, etc., at 100 g/10 are. Also prepd. and tested effective were 20 addnl. I.

IT **123096-65-1**
RL: RCT (Reactant); RACT (Reactant or reagent)
(chlorination of, in prepn. of **herbicide**)

RN 123096-65-1 CAPLUS

CN 2-Cyclohexen-1-one, 2-(4-chloro-2-nitrobenzoyl)-3-hydroxy-5-[(phenylthio)methyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 119 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1991:163696 CAPLUS

DOCUMENT NUMBER: 114:163696

TITLE: Preparation of 2-[1-(ethoxyimino)propyl]-5-indanylcyclohexene-1,3-diones and analogs as **herbicides** and **plant** growth regulators

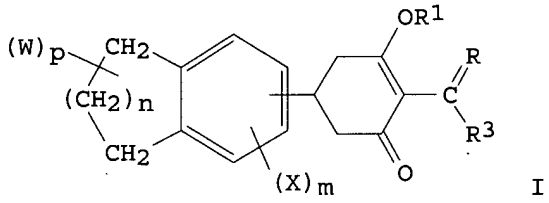
INVENTOR(S): Serban, Alexander; Watson, Keith Geoffrey; Bird, Graham J.; Farquharson, Graeme J.; Cross, Lindsay E.

09/ 943,037

PATENT ASSIGNEE(S): ICI Australia Ltd., Australia
SOURCE: U.S., 34 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 4952722	A	19900828	US 1983-461003	19830126
US 5110989	A	19920505	US 1990-553413	19900717

PRIORITY APPLN. INFO.: AU 1982-2693 19820212
AU 1982-4686 19820702
US 1983-461003 19830126
OTHER SOURCE(S): CASREACT 114:163696; MARPAT 114:163696
GI



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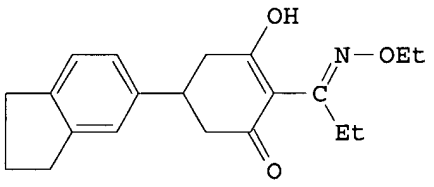


II

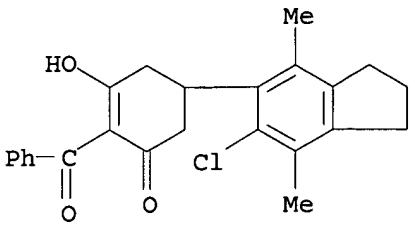
AB The title compds. [I; R = NOR2; R1 = H, (un)substituted C1-6 alkyl, C2-6 alkenyl or alkynyl; C1-6 (alkyl)sulfonyo, 2-furoyl, 2-thenoyl, an (in)org. cation, etc.; R2 = (un)substituted C1-6 alkyl, C2-6 (halo)alkenyl, C2-6 (halo)alkynyl, etc.; R3 = C1-6 (fluoro)alkyl, C2-6 alkenyl or alkynyl, Ph; W = C1-8 alkyl, C2-6 alkenyl, C2-6 alkynyl; X = OH, halo, NO2, cyano (un)substituted C1-6 alkyl, C2-6 alkenyl, C2-6 alkynyl, (un)substituted C1-6 alkoxy(carbonyl), (un)substituted benzyloxy, etc.; m = 0-4; n, p = 0-3 with a proviso] showing cereal selective herbicidal properties, were prepd. by condensation reaction of 2-acyl-5-arylcyclohexene-1,3-diones with the appropriate hydroxylamine derivs. Thus, condensation of 1-(5-indanyl)but-1-en-3-one (prepn. from indane-5-carboxaldehyde and Me2CO in 81% yield given) with CH2(CO2Et)2 gave 79.6% 3-hydroxy-5-(5-indanyl)cyclohex-2-en-1-one. Propionylation of the latter followed by rearrangement in the presence of AlCl3 gave 27% 3-hydroxy-5-(5-indanyl)-2-propionylcyclohex-2-en-1-one which in EtOH was stirred with EtONH2.HCl and NaOH for 4 h at room temp. to give 94.8% title compd. II. The latter at 2.0 kg/ha preemergence and at 0.5 kg/ha postemergence gave 100% control of ryegrass and Japanese millet with no damage of wheat. Emulsifiable conc., aq. suspension, dusting powder, etc. contg. I were formulated.

IT **88633-70-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and reaction of, in prepn. of **herbicide** and **plant** growth regulator)

RN 88633-70-9 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-5-(6-chloro-2,3-dihydro-4,7-dimethyl-1H-

09/ 943,037

inden-5-yl)-3-hydroxy- (9CI) (CA INDEX NAME)



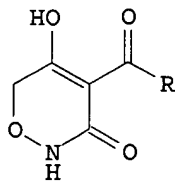
L7 ANSWER 120 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1991:143431 CAPLUS
DOCUMENT NUMBER: 114:143431
TITLE: Preparation of 4-arylcarbonyl-3,5-oxazinediones as **herbicides plant** growth regulators, and acaricides
INVENTOR(S): Lee, Shy Fuh
PATENT ASSIGNEE(S): Sandoz A.-G., Switz.; Sandoz-Patent-G.m.b.H.; Sandoz-Erfindungen Verwaltungsgesellschaft m.b.h.
SOURCE: Eur. Pat. Appl., 13 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 394889	A2	19901031	EP 1990-107606	19900421
EP 394889	A3	19910206		
EP 394889	B1	19940803		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE				
ES 2057246	T3	19941016	ES 1990-107606	19900421
AU 9053771	A1	19901101	AU 1990-53771	19900423
AU 628521	B2	19920917		
HU 54126	A2	19910128	HU 1990-2529	19900423
HU 205750	B	19920629		
IL 94165	A1	19950831	IL 1990-94165	19900423
CA 2015242	AA	19901025	CA 1990-2015242	19900424
CN 1046900	A	19901114	CN 1990-102540	19900424
CN 1025613	B	19940810		
JP 02295905	A2	19901206	JP 1990-109943	19900424
JP 2896190	B2	19990531		
BR 9001894	A	19910730	BR 1990-1894	19900424
PL 163354	B1	19940331	PL 1990-284910	19900424
SK 280379	B6	19991210	SK 1990-2040	19900424
ZA 9003144	A	19911224	ZA 1990-3144	19900425
RU 2013956	C1	19940615	RU 1991-5001604	19911002
US 5336662	A	19940809	US 1992-994048	19921214
US 5565410	A	19961015	US 1994-232919	19940425
US 5780626	A	19980714	US 1995-451279	19950526
US 5728831	A	19980317	US 1996-660969	19960612

PRIORITY APPLN. INFO.: US 1989-343093 A 19890425
US 1990-497154 B2 19900320
US 1990-604708 B1 19901025
US 1992-902609 B1 19920623
US 1992-994048 A3 19921214
US 1994-232919 A1 19940425
OTHER SOURCE(S): MARPAT 114:143431

09/ 943,037

GI



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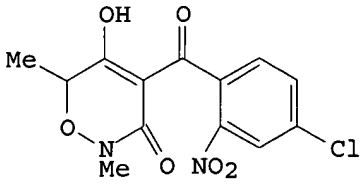


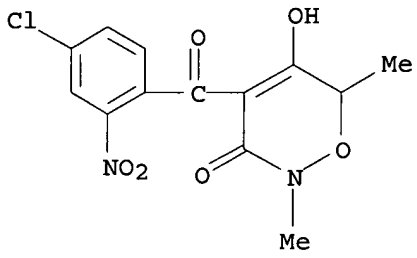
II

AB The title compds. [I; R = (substituted) (hetero)aryl; any free H in the oxazine may be replaced with an agriculturally acceptable substituent], were prepd. as selective **herbicides** (no data). Thus, 2,6-dimethyl-5-(4-chloro-2-nitrobenzoyloxy)-6H-1,2-oxazine-3-one was stirred overnight with Et3N and acetone cyanohydrin to give title compd. II.

IT **132787-00-9P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 132787-00-9 CAPLUS

CN 2H-1,2-Oxazin-3(6H)-one, 4-(4-chloro-2-nitrobenzoyl)-5-hydroxy-2,6-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 121 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1990:532015 CAPLUS
DOCUMENT NUMBER: 113:132015
TITLE: Preparation of (cyclohexenylcarbonyl)pyridine derivatives as **herbicides**
PATENT ASSIGNEE(S): Ciba-Geigy A.-G., Switz.
SOURCE: Jpn. Kokai Tokkyo Koho, 45 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 02078662	A2	19900319	JP 1989-192443	19890725
IL 91083	A1	19930404	IL 1988-91083	19880724
US 4995902	A	19910226	US 1989-378119	19890711
DD 284002	A5	19901031	DD 1989-331047	19890721
AU 8938929	A1	19900125	AU 1989-38929	19890724
AU 621638	B2	19920319		
DK 8903651	A	19900126	DK 1989-3651	19890724

CN 1039808	A	19900221	CN 1989-106091	19890724
BR 8903654	A	19900313	BR 1989-3654	19890724
HU 50774	A2	19900328	HU 1989-3723	19890724
HU 206497	B	19921130		
ZA 8905610	A	19900328	ZA 1989-5610	19890724
RO 104618	B1	19921202	RO 1989-140952	19890724

PRIORITY APPLN. INFO.: CH 1988-2825 A 19880725
CH 1989-29 A 19890105

OTHER SOURCE(S): MARPAT 113:132015

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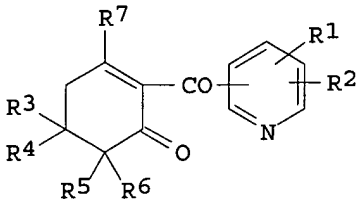

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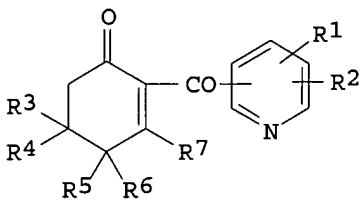

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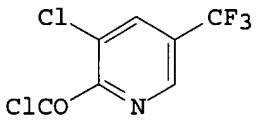
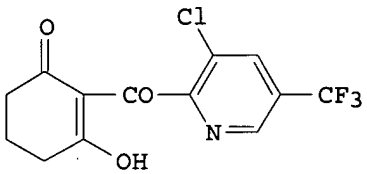


III



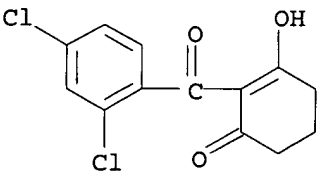
IV

AB The title compds. [I, II; R1, R2 = H, halo, NO2, cyano, C1-4 alkyl, alkoxy, alkylthio, etc.; R3-R5 = H, (substituted) C1-4 alkyl, C1-4 alkoxy, alkylthio, etc.; R6 = H, C1-4 alkyl, C1-4 alkoxycarbonyl, cyano; R7 = OH, OM wherein M = nonvalent metal ion, ammonium, C1-4 (hydroxy)alkyl, alkoxyalkyl] are prepd. Acid chloride III was added dropwise to a soln. of 1,3-cyclohexanedione and Et3N in CH2Cl2 with stirring at room temp. to give 63% title compd. IV, which showed 100% kill of Abutilon, Solanum nigrum, etc., without any harm to wheat, barley, etc. at 1000 g/ha as an aq. emulsion.

IT **129233-41-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 129233-41-6 CAPLUS

CN 2-Cyclohexen-1-one, 2-(2,4-dichlorobenzoyl)-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 122 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1990:531779 CAPLUS

09/ 943,037

DOCUMENT NUMBER: 113:131779
TITLE: Substituted bicycloalkyl-1,3-diones
INVENTOR(S): Lee, Shy Fuh; Luehr, Gary W.; Scott, Carol R.; Trueb, Werner
PATENT ASSIGNEE(S): Sandoz A.-G., Switz.
SOURCE: U.S., 5 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 4921526	A	19900501	US 1987-125843	19871127

PRIORITY APPLN. INFO.: US 1987-125843 19871127
OTHER SOURCE(S): CASREACT 113:131779; MARPAT 113:131779
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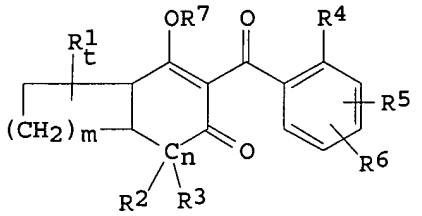

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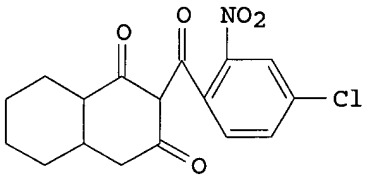
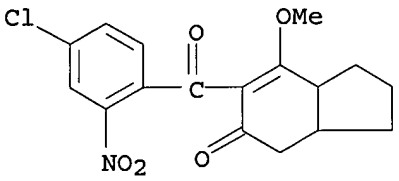


II

AB Title compds. I (R1 = C1-8 alkyl; R2, R3 = H, C1-8 alkyl, R8O2C, R8 = H, C1-8 alkyl; R4 = (un)substituted C1-8 alkyl, (un)substituted C1-8 alkoxy, R10On.S, R10 = (un)substituted C1-8 alkyl; R5, R6 = H, halo, (un)substituted C1-8 alkyl, (un)substituted C1-8 alkoxy, C1-8 alkylcarbonyl, C1-8 alkoxycarbonyl, R8R96N, R8R9NSO2, R9 = H, C1-8 alkyl, etc.; m = 0-3; n = 0, 1; n' = 0, 2; t = 0-6) useful as **herbicides** (no data) are prepd.; to a mixt. of 1-(4-chloro-2-nitrobenzoyloxy)-4a,5,6,7,8,8a-hexahydro-3(4H)-naphthalenone and 3-(4-chloro-2-nitrobenzoyloxy)-4a,5,6,7,8,8a-hexahydro-1(4H)-naphthalenone in MeCN is added Et3N followed by acetone cyanohydrin and the mixt. is stirred overnight at room temp. to give the naphthalenedione II.

IT **128995-36-8P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

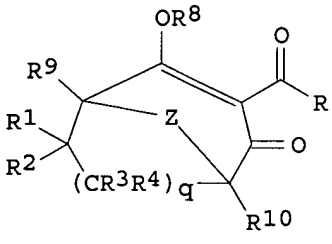
RN 128995-36-8 CAPLUS
CN 5H-Inden-5-one, 6-(4-chloro-2-nitrobenzoyl)-1,2,3,3a,4,7a-hexahydro-7-methoxy- (9CI) (CA INDEX NAME)



L7 ANSWER 123 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1990:216442 CAPLUS
DOCUMENT NUMBER: 112:216442
TITLE: Preparation of benzoylbicyclodiones as **herbicides**, **plant** growth regulators, and acaricides
INVENTOR(S): Lee, Shy Fuh
PATENT ASSIGNEE(S): Sandoz A.-G., Switz.; Sandoz-Patent-G.m.b.H.; Sandoz-Erfindungen Verwaltungsgesellschaft m.b.H.
SOURCE: Eur. Pat. Appl.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 338992	A2	19891025	EP 1989-810287	19890417
EP 338992	A3	19910724		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
AU 8933091	A1	19891019	AU 1989-33091	19890417
AU 616956	B2	19911114		
DK 8901844	A	19891019	DK 1989-1844	19890417
CN 1038093	A	19891220	CN 1989-102563	19890417
JP 02006425	A2	19900110	JP 1989-98634	19890417
JP 2790479	B2	19980827		
BR 8901825	A	19891128	BR 1989-1825	19890418
ZA 8902838	A	19901228	ZA 1989-2838	19890418

PRIORITY APPLN. INFO.: US 1988-182534 19880418
OTHER SOURCE(S): MARPAT 112:216442
GI



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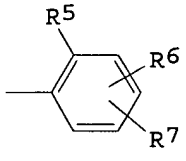
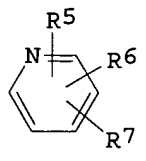
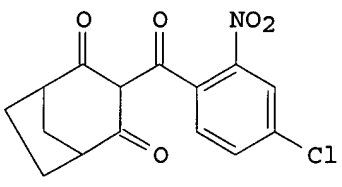


Q1



Q2



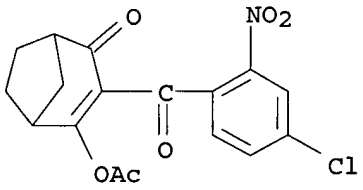
II

AB Title compds. I [Z = S, C1-4 alkylene; R = Q1, Q2; R1-R4, R9, R10 = H, alkyl, CO2H, alkoxycarbonyl; R5, R6, R7 = (halo)alkyl or alkoxy, alkyl- or alkoxycarbonyl, (mono- or dialkyl)amino, halo, cyano, NO2, etc.; in addn., R6, R7 = H; R6R7 = group to form a fused ring; R8 = H, alkyl, alkyl- or alkoxycarbonyl, etc.; q = 0-2], useful as **herbicides**, **plant** growth regulators, and/or acaricides (no data), are prepd. Treatment of 4-(4-chloro-2-nitrobenzoyloxy)bicyclo[3,2,1]oct-3-en-2-one in MeCN with Me2C(OH)CN in the presence of Et3N gave title compd. II. Formulation examples are given.

IT **126657-03-2P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**, **plant** growth regulator, and/or acaricide)

RN 126657-03-2 CAPLUS

CN Bicyclo[3.2.1]oct-3-en-2-one, 4-(acetyloxy)-3-(4-chloro-2-nitrobenzoyl)-(9CI) (CA INDEX NAME)

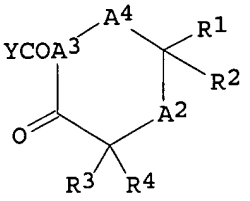


L7 ANSWER 124 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1990:215765 CAPLUS
DOCUMENT NUMBER: 112:215765
TITLE: Preparation of 2-aroyl-1,3-cyclohexanediones and analogs as **herbicides**
INVENTOR(S): Anderson, Richard J.; Grina, Jonas; Kuhnen, Fred; Lee, Shy Fuh; Luehr, Gary Wayne; Schneider, Hermann; Seckinger, Karl
PATENT ASSIGNEE(S): Sandoz-Patent-G.m.b.H., Fed. Rep. Ger.
SOURCE: Ger. Offen., 38 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3902818	A1	19890810	DE 1989-3902818	19890131
HU 50312	A2	19900129	HU 1989-232	19890120
DK 8900409	A	19890802	DK 1989-409	19890130
FR 2626573	A1	19890804	FR 1989-1257	19890130
GB 2215333	A1	19890920	GB 1989-2016	19890130
AU 8928955	A1	19890803	AU 1989-28955	19890131
BR 8900420	A	19890926	BR 1989-420	19890131
CN 1036202	A	19891011	CN 1989-101743	19890131
JP 02001422	A2	19900105	JP 1989-22460	19890131
NL 8900243	A	19890901	NL 1989-243	19890201
ZA 8900793	A	19901031	ZA 1989-793	19890201
PRIORITY APPLN. INFO.:			US 1988-150699	19880201
			US 1988-158429	19880222

09/ 943,037

GI



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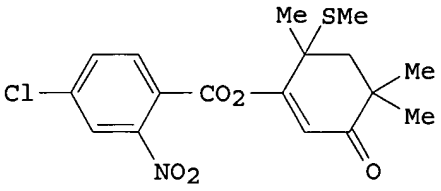

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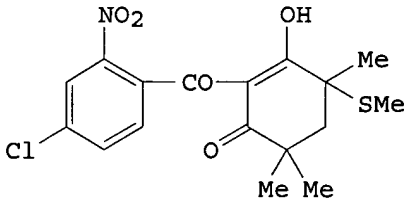


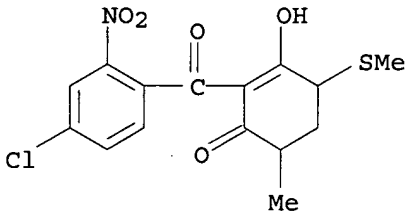
III

AB The title compds. [I; A2 = bond, O, S, (un)substituted CH2, CH2CH2, etc.; A3A4 = C:C(OR), CX1CO; R = H, salt-forming group, ether or ester residue; R1 - R4 = C1-6 unsatd. hydrocarbyl, C3-6 cycloalkyl, Ar, A1nX; R1R2 = C2-5 alkylene, O, C1-5 alkylidine; R3R4 = C2-5 alkylene; A1 = (C1-5 alkyl-substituted) CH2, CH2CH2; Ar = (un)substituted heteroaryl; X = H, hydrocarbyloxy, halo, PhCH2, etc.; X1 = Cl, F; Y = substituted Ph, heteroaryl; n = 0,1] were prepd. Thus, 4,6,6-trimethyl-1,3-cyclohexadione was stirred 30 min at -70.degree. with(Me2CH)2NLi followed by addn. of (MeS)2 and the product stirred 3 h with 4,2-Cl(O2N)C6H3COCl in CH2Cl2 contg. Et3N to give a benzoate II which was stirred 3 h with Me2C(OH)CN and Et3N in MeCN to give a title compd. III which gave .apprx.90-100% herbicidal effect against 7 of 8 needs at 0.25, 1, and/or 4 kg/ha preemergent.

IT **123095-63-6P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as **herbicide**)

RN 123095-63-6 CAPLUS

CN 2-Cyclohexen-1-one, 2-(4-chloro-2-nitrobenzoyl)-3-hydroxy-6-methyl-4-(methylthio)- (9CI) (CA INDEX NAME)



L7 ANSWER 125 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1990:158054 CAPLUS

DOCUMENT NUMBER: 112:158054

TITLE: Preparation of substituted aryl or heteroaryl diones as acaricides and **herbicides**

INVENTOR(S): Anderson, Richard James; Craig, Gerald Wayne; Kirkpatrick, Joel Lee; Lee, Shy Fuh; Luehr, Gary Wayne

PATENT ASSIGNEE(S): Sandoz A.-G., Switz.; Sandoz-Patent-G.m.b.H.; Sandoz-Erfindungen Verwaltungsgesellschaft m.b.H.

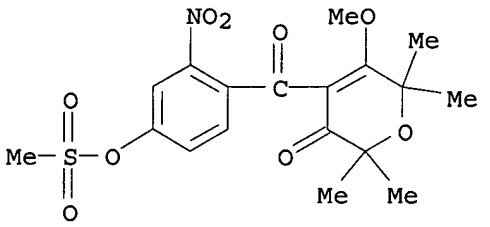
SOURCE: Eur. Pat. Appl., 14 pp.

09/ 943,037

CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 336898	A2	19891011	EP 1989-810240	19890331
EP 336898	A3	19900829		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
HU 49873	A2	19891128	HU 1989-1389	19890322
HU 202851	B	19910429		
AU 8932382	A1	19891005	AU 1989-32382	19890403
AU 619533	B2	19920130		
DK 8901603	A	19891005	DK 1989-1603	19890403
CN 1037338	A	19891122	CN 1989-103206	19890403
JP 02006426	A2	19900110	JP 1989-84630	19890403
PL 158213	B1	19920831	PL 1989-278619	19890403
SU 1760982	A3	19920907	SU 1989-4613903	19890403
BR 8901581	A	19891121	BR 1989-1581	19890404
ZA 8902473	A	19901228	ZA 1989-2473	19890404

PRIORITY APPLN. INFO.: US 1988-177192 19880404
OTHER SOURCE(S): MARPAT 112:158054
GI For diagram(s), see printed CA Issue.
AB Title compds. I (R1, R4 = H, Me; R2 = H, Me, MeS; R3 = H, Me, Et; R5 = Cl, O2N; R6 = H, Cl, MeO; R7 = MeSO3, EtSO3, PhSO3, Me2CHSO3; X = O, H2C, MeCH, Me2C), useful as acaricides and **herbicides** (no data), are prepd. 2,2,6,6-Tetramethyl-5-(3-methoxy-4-methylsulfonyloxy-2-nitrobenzyloxy)-3,6-dihydro-2H-pyran-3-one is MeCN was added to Et3N and acetone cyanohydrin to give I (R1-R4 = Me; R5 = O2N; R6 = MeO; R7 = MeSO3).
IT **126070-78-8P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as intermediate for aryl and heteroaryl diones)
RN 126070-78-8 CAPLUS
CN 2H-Pyran-3(6H)-one, 5-methoxy-2,2,6,6-tetramethyl-4-[4-[(methylsulfonyl)oxy]-2-nitrobenzoyl]- (9CI) (CA INDEX NAME)



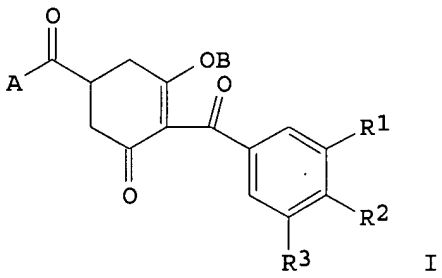
L7 ANSWER 126 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1990:32145 CAPLUS
DOCUMENT NUMBER: 112:32145
TITLE: Preparation of 4-benzoyl-3-hydroxy-5-oxo-3-cyclohexenecarboxylic acid derivatives as **plant** growth regulators
INVENTOR(S): Angermann, Alfred; Franke, Helga; Johann, Gerhard
PATENT ASSIGNEE(S): Schering A.-G., Fed. Rep. Ger.
SOURCE: Eur. Pat. Appl., 20 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German

09/ 943,037

FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 320864	A2	19890621	EP 1988-120767	19881213
EP 320864	A3	19890823		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
DE 3743695	A1	19890629	DE 1987-3743695	19871218
US 4943310	A	19900724	US 1988-285821	19881216
JP 02000224	A2	19900105	JP 1988-318729	19881219

PRIORITY APPLN. INFO.: DE 1987-3743695 19871218
OTHER SOURCE(S): CASREACT 112:32145
GI

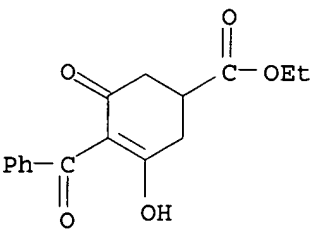


I

AB I [A = OH, alkoxy, (un)substituted amino, etc.; B = H, cation; R1, R2, R3 = H, halo, OH, (un)substituted alkyl, etc.] are prepd. as **plant** growth regulators via intramol. rearrangement, by amidation or esterification of acid precursors, or by condensation of benzoic acid derivs. with oxocyclohexenol derivs. I (R1-R3 = B = H, A = OEt) was prepd. by reacting Et 3,5-dioxocyclohexanecarboxylate with BzCl to give Et 3-benzoyloxy-5-oxo-3-cyclohexenecarboxylate, which was rearranged using 2-hydroxyisobutyronitrile as catalyst. I (R1 = R3 = B = H, R2 = Cl, A = OEt) (II) 20, isophorone 75, ethoxylated castor oil 2, and Ca dodecylbenzenesulfonate 3% were formulated as an emulsifiable conc. II (1.0 kg/ha) was tested postemergence on rice and barley. The growth rates were .ltoreq.60% of those of control **plants** after 14 days.

IT **124426-86-4P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **plant** growth regulator)

RN 124426-86-4 CAPLUS
CN 3-Cyclohexene-1-carboxylic acid, 4-benzoyl-3-hydroxy-5-oxo-, ethyl ester (9CI) (CA INDEX NAME)



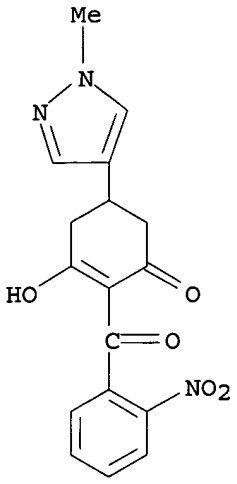
L7 ANSWER 127 OF 149 CAPLUS COPYRIGHT 2003 ACS

09/ 943,037

ACCESSION NUMBER: 1989:594758 CAPLUS
DOCUMENT NUMBER: 111:194758
TITLE: Preparation of 2-benzoyl-5-pyrazolyl-1,3-cyclohexanedione derivatives as **herbicides**
INVENTOR(S): Machitani, Kozo; Kono, Eiji; Hamaguchi, Hiroshi; Kamata, Jusuke; Ookawa, Katsumasa
PATENT ASSIGNEE(S): Nihon Nohyaku Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 31 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 01110674	A2	19890427	JP 1988-163062	19880630

PRIORITY APPLN. INFO.: JP 1987-163609 19870630
OTHER SOURCE(S): MARPAT 111:194758
GI For diagram(s), see printed CA Issue.
AB The title compds. [I; R1 = lower alkyl, halo, Ph optionally substituted by 1-3 of lower alkyl and lower alkoxy; R2 = H, lower (halo)alkyl; R3 = H, halo, lower alkyl, lower alkoxy, dialkylamino, (un)substituted Ph, lower alkylthio, -sulfinyl, or -sulfonyl; R4 = H, alkali metal, lower alkylcarbonyl, (lower alkyl) Bz, (un)substituted Ph; R5 = H, lower alkyl, lower alkoxycarbonyl; X = H, halo, cyano, NO2, lower (halo)alkyl, lower alkoxy, lower dialkylaminosulfonyl, lower alkylthio, -sulfinyl, or -sulfonyl; X2 = methylenedioxy; n = 1-3] were prepd. as **herbicides**. To a mixt. of 5-(1-methyl-1H-pyrazol-4-yl)-1,3-cyclohexanedione, 2,4-Cl2C6H3COCN, and ZnCl2 in CH2Cl2 in ice was added dropwise Et3N. The resulting mixt. was allowed to react overnight at room temp. to give 34% 5-(pyrazol-4-yl)-1,3-cyclohexanedione (II; R6 = 2,4-Cl2C6H3CO). Some of II at 50 g/are postemergence controlled .gtoreq.95% weeds (one-leaf stage) of rice paddy such as Echinochloa crus-gali, Scirpus guncoides, Cyperus serotinus, or Sagittaria pygmaea, while inflicting no damage to rice **plants**. A wettable powder contg. II [R6 = 2,4-(O2N)BrC6H3CO] 50, clay-white carbon 45, and polyoxyethylene nonylphenyl ether 5 parts was formulated.
IT **123275-03-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)
RN 123275-03-6 CAPLUS
CN 2-Cyclohexen-1-one, 3-hydroxy-5-(1-methyl-1H-pyrazol-4-yl)-2-(2-nitrobenzoyl)- (9CI) (CA INDEX NAME)

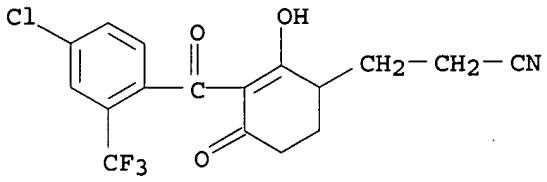


L7 ANSWER 128 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:573765 CAPLUS
DOCUMENT NUMBER: 111:173765
TITLE: Preparation of benzoylcyclohexanediones as **herbicides**
INVENTOR(S): Ueda, Akiyoshi; Ohishi, Haruhito; Aihara, Toshio; Ishikawa, Hideo; Tomida, Kazuyuki; Hosaka, Hideo
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: Eur. Pat. Appl., 31 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 319075	A2	19890607	EP 1988-202624	19881122
EP 319075	A3	19900530		
EP 319075	B1	19940720		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
JP 02000726	A2	19900105	JP 1988-294743	19881124
CA 1337818	A1	19951226	CA 1988-584351	19881128

PRIORITY APPLN. INFO.: JP 1987-301304 19871128
OTHER SOURCE(S): MARPAT 111:173765
GI For diagram(s), see printed CA Issue.
AB The title compds. [I; R = H, C1-6 alkylcarbonyl, arylcarbonyl, etc.; R1 = OH, cyano, NO2, C1-6 alkylcarbonyl, etc.; R2 = halo, C1-6 alkyl, C1-6 alkoxylcarbonyl, etc.; X = halo, OH, NO2, cyano, C1-6 alkyl, etc.; Y = C1-6 alkylene; m = 0, 1; n, l = 0-5; R1 .noteq. (substituted) furyl when m = 0], useful as **herbicides**, were prepd. A mixt. of 5-methoxyethylcyclohexane-1,3-dione and 2-nitro-4-chlorobenzoyl chloride in CH2Cl2 contg. Et3N was stirred 3 h at room temp. to give a crude product. Et3N, KCN, and 18-crown-6 were added to a MeCN soln. of the latter and the reaction mixt. was stirred 10 h at room temp. to give 53.8% 5-methoxyethyl-2-(2-nitro-4-chlorobenzoyl)cyclohexane-1,3-dione. In a preemergence test the latter at 100 g/10 are gave complete control of barnyard grass. A powder contg. I (R = H, R1Ym = 5-MeOCH2CH2CH2, Xn = 2-NO2 and 4-SO2Me, l = 0) 20, white carbon 20, diatomaceous earth 52 and Na alkylsulfate 8 wt. parts was prepd.
IT **123095-34-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except

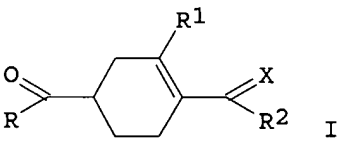
adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)
RN 123095-34-1 CAPLUS
CN 2-Cyclohexene-1-propanenitrile, 3-[4-chloro-2-(trifluoromethyl)benzoyl]-2-hydroxy-4-oxo- (9CI) (CA INDEX NAME)



L7 ANSWER 129 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:423291 CAPLUS
DOCUMENT NUMBER: 111:23291
TITLE: Preparation of 5-oxo-3-cyclohexene-1-carbothioates as **herbicides** and **plant** growth regulators
INVENTOR(S): Keil, Michael; Schirmer, Ulrich; Kast, Juergen; Kolassa, Dieter; Wuerzer, Bruno; Meyer, Norbert; Rademacher, Wilhelm; Jung, Johann; Carlson, Dale R.
PATENT ASSIGNEE(S): BASF A.-G., Fed. Rep. Ger.
SOURCE: Eur. Pat. Appl., 24 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 293817	A1	19881207	EP 1988-108664	19880531
EP 293817	B1	19900801		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, NL, SE				
DE 3718899	A1	19881222	DE 1987-3718899	19870605
AT 55118	E	19900815	AT 1988-108664	19880531
AU 8817326	A1	19881208	AU 1988-17326	19880603
AU 604911	B2	19910103		
CA 1303055	A1	19920609	CA 1988-568623	19880603
JP 63316765	A2	19881226	JP 1988-137589	19880606
US 5009702	A	19910423	US 1989-327352	19890322

PRIORITY APPLN. INFO.: DE 1987-3718899 19870605
EP 1988-108664 19880531
US 1988-201891 19880603
US 1988-240465 19880902
OTHER SOURCE(S): CASREACT 111:23291; MARPAT 111:23291
GI



I

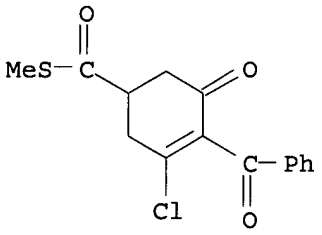
AB The title compds. [I; R = R3S; R1 = Cl, OH, C1-6 alkenylthio, C3-6

cycloalkylthio, (un)substituted C1-6 alkylthio, PhS, PhCH2S; R2 = C1-6 alkyl, cyclopropyl; R3 = H, C1-6 alkenyl, C3-6 cycloalkyl, (un)substituted C1-6 alkyl, PH, PhCH2; X = O, R4ON, R5N; R4 = C1-4 alkyl, C2-4 haloalkyl, C2-4 alkoxyalkyl, C3-4 (halo)alkenyl, C3-4 alkynyl; R5 = H, C1-6 alkyl; C1-4 hydroxyalkyl, C1-4 alkoxyalkyl, Ph, PhCH2] and their agriculturally acceptable salts were prepd. I are **herbicides** [esp. I (X = R4ON)] (no data) and **plant** growth regulators [esp. I (X = R5N)]. 4-Butyryl-3,5-dioxocyclohexanecarboxylic acid (10.0 g) was stirred 16 h at 25.degree. with (COCl)2 and the resulting acid chloride was stirred 3 h at 0.degree. with EtSH in THF contg. Et3N to give 10.1 g I (R = R1 = EtS, R2 = Pr, X = O). In postemergence tests in wheat I (R1 = CH2:CHCH2S, R1 = OH, R2 = Et, X = O), at 6 mg/**plant** reduced stem length 41.1%.

IT **120074-11-5P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as **herbicide** and **plant** hormone)

RN 120074-11-5 CAPLUS

CN 3-Cyclohexene-1-carbothioic acid, 4-benzoyl-3-chloro-5-oxo-, S-methyl ester (9CI) (CA INDEX NAME)



L7 ANSWER 130 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1989:212608 CAPLUS

DOCUMENT NUMBER: 110:212608

TITLE: Benzoylpyrandiones and their analogs, herbicidal compositions containing them, and their prepararion

INVENTOR(S): Anderson, Richard James; Lee, Shy Fuh; Luehr, Gary Wayne; Scott, Carole Ruth

PATENT ASSIGNEE(S): Sandoz A.-G., Switz.

SOURCE: Brit. UK Pat. Appl., 28 pp.
CODEN: BAXXDU

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

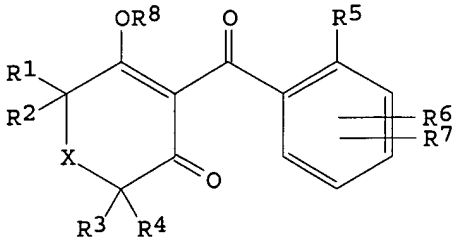
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
GB 2205316	A1	19881207	GB 1988-12964	19880601
GB 2205316	B2	19910911		
FR 2616148	A1	19881209	FR 1988-7387	19880602
FR 2616148	B1	19940107		
BE 1002286	A4	19901120	BE 1988-626	19880602
CH 676239	A	19901228	CH 1988-2099	19880602
DK 8803058	A	19881206	DK 1988-3058	19880603
AU 8817366	A1	19881208	AU 1988-17366	19880603
DE 3818958	A1	19881222	DE 1988-3818958	19880603
BR 8802720	A	19881227	BR 1988-2720	19880603
NL 8801430	A	19890102	NL 1988-1430	19880603
HU 49850	A2	19891128	HU 1988-2905	19880603
CN 88103413	A	19881214	CN 1988-103413	19880604
JP 01045377	A2	19890217	JP 1988-138252	19880604
US 5006150	A	19910409	US 1990-530487	19900529

09/ 943,037

PRIORITY APPLN. INFO.: US 1987-58443 19870605
US 1988-156269 19880212
US 1988-185566 19880425
US 1989-360551 19890601

OTHER SOURCE(S): MARPAT 110:212608

GI



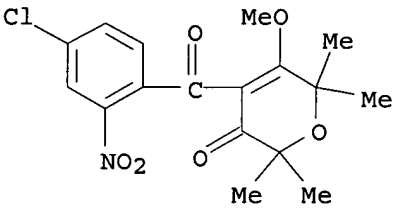
I

AB Title compds. I [X = O, SOn, etc.; R1-R4 = H, alkyl, CO2R9; or R1R2 = alkylene; R5 = (substituted) alkyl, alkoxy, etc.; R6, R7 = H, halo, (substituted) alkyl, alkoxy, alkylcarbonyl, etc.; neither R6 nor R7 is attached at the 6 position; R8 = H, alkyl, alkylcarbonyl, alkoxycarbonyl, etc.; R9 = H, alkyl; n = 0-2], useful as **herbicides**, were prepd. A mixt. of 2,2,6,6-tetramethyl-5-(4-chloro-2-nitrobenzoyloxy)-3,6-dihydro-2H-pyran-3-one and Et3N in MeCN contg. acetone cyanohydrin was stirred at room temp. for 24 h to give 2,2,6,6-tetramethyl-4-(4-chloro-2-nitrobenzoyl)-2H-pyran-3,5-(4H,6H)-dione (II). II at 1 kg/ha preemergent gave complete control of the grasses green foxtail, watergrass, shattercane, and wild oats. A conc. contg. II 20, H2O 63.83 propylene glycol 8.55, Na sulfonate of naphthalene-formaldehyde condensate 6.82, colloidal Mg Al silicate 0.5, xanthan gum 0.27, and acetylonic glycol blend in propylene glycol 0.03% was prepd.

IT **120509-08-2P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 120509-08-2 CAPLUS

CN 2H-Pyran-3(6H)-one, 4-(4-chloro-2-nitrobenzoyl)-5-methoxy-2,2,6,6-tetramethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 131 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1989:212209 CAPLUS

DOCUMENT NUMBER: 110:212209

TITLE: Preparation of cyclohexenyl ketoxime ether derivatives as **herbicides**

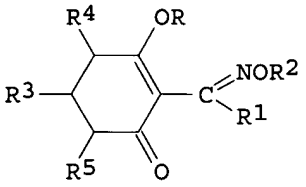
INVENTOR(S): Gilkerson, Terence; Jennens, David Clifford; Shaw, Robert William

09/ 943,037

PATENT ASSIGNEE(S): Shell Internationale Research Maatschappij B. V., Neth.
SOURCE: Eur. Pat. Appl., 63 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 291114	A2	19881117	EP 1988-200850	19880429
EP 291114	A3	19900131		
EP 291114	B1	19930825		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
US 4921524	A	19900501	US 1988-181410	19880414
AT 93512	E	19930915	AT 1988-200850	19880429
BR 8802316	A	19881213	BR 1988-2316	19880512
CN 88102756	A	19881221	CN 1988-102756	19880512
DK 8802652	A	19881116	DK 1988-2652	19880513
FI 8802254	A	19881116	FI 1988-2254	19880513
FI 94338	B	19950515		
FI 94338	C	19950825		
AU 8816119	A1	19881117	AU 1988-16119	19880513
AU 612651	B2	19910718		
JP 63313763	A2	19881221	JP 1988-115026	19880513
ZA 8803388	A	19881228	ZA 1988-3388	19880513
HU 48207	A2	19890529	HU 1988-2401	19880513
HU 200750	B	19900828		
CS 274506	B2	19910411	CS 1988-3248	19880513
SU 1823785	A3	19930623	SU 1988-4355720	19880513

PRIORITY APPLN. INFO.: GB 1987-11525 19870515
EP 1988-200850 19880429
OTHER SOURCE(S): MARPAT 110:212209
GI



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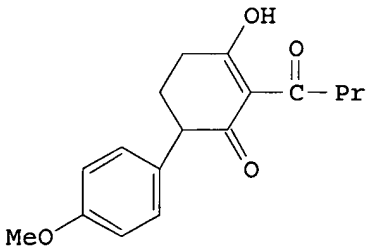


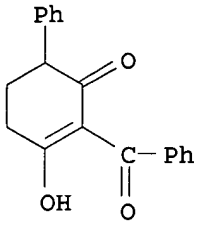
II

AB The title compds. [I; R = H, alkyl, acyl, alkenyl, alkynyl, org. or inorg. cation; R1 = (halo)alkyl, alkenyl, alkynyl, Ph; R2 = alkyl, aralkyl, cycloalkyl, (halo)alkenyl, (halo)alkynyl; R3 = H, alkyl; R4, R5 = H, alkyl, aryl], useful as **herbicides**, are prepd. Butyrylation of 4-(4-methoxyphenyl)-1,3-cyclohexanedione with PrCOCl and Et2N in CH2Cl2 gave a mixt. of isomeric enol butyrates, which was refluxed with 4-(dimethylamino)pyridine in MePh to give cyclohexenone II. A soln. of II 2.9, Et3N 1.2, and H2C:CHCH2ONH2.HCl 1.2 g in EtOH was stirred at room temp. to give 2.3 g I (R = R3 = R4 = H, R1 = Pr, R2 = allyl, R5 = 4-MeOC6H4), which gave 100% control of Echinochloa crus-galli and Avena sativa at 5 kg/ha.

IT **120630-73-1P**

09/ 943,037

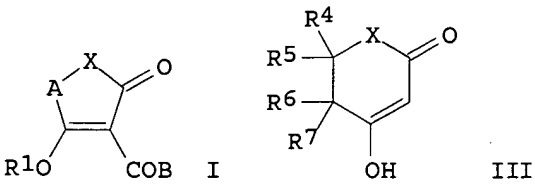
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and oximation of, in prepn. of **herbicides**)
RN 120630-73-1 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-6-phenyl- (9CI) (CA INDEX NAME)



L7 ANSWER 132 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:95006 CAPLUS
DOCUMENT NUMBER: 110:95006
TITLE: Preparation of 3-pyrrolin-2-ones and 2-pyridinones as **herbicides**
INVENTOR(S): Oishi, Haruhito; Ueda, Akiyoshi; Kawai, Tadashi; Okabe, Takashi; Ishikawa, Hisao; Inaba, Hideo; Sato, Atsushi
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: PCT Int. Appl., 46 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 8804652	A1	19880630	WO 1987-JP985	19871216
W: AU, BG, BR, HU, JP, KR, RO, SU, US				
RW: AT, BE, CH, DE, FR, GB, IT, LU, NL, SE				
AU 8810440	A1	19880715	AU 1988-10440	19871216
PRIORITY APPLN. INFO.:			JP 1986-298816	19861217
			WO 1987-JP985	19871216

OTHER SOURCE(S): MARPAT 110:95006
GI



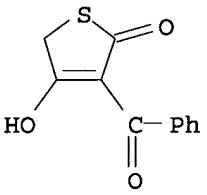
AB Title compds. I [R1 = H, (alkoxycarbonyl-substituted) alkyl, R2Z [R2 = alkyl, (halo-, alkyl- or NO2-substituted)Ph; Z = CO, SO2], P(:Y)(OR2)OR3 (Y = O, S; R2, R3 = alkyl); A = (CR4R5)nCR6R7 [R4-R7 = H, alkyl, (halo- or alkyl-substituted) Ph; n = 0, 1, when n = 1, R4 (or R5)R6 (or R7) = bond]; B = (substituted) Ph, (substituted)naphthyl, (substituted) 5-10 membered S-, O- or N-contg. heterocyclyl) 5-10-membered S-, O- or N-contg.

heterocyclyl; X = O, S, NR8 (R8 = H, alkyl)] are prepd. by cyclization of MXCR6R7COCH(CO2Q)COB (II; M = H, protecting group of HX, Q = H, alkyl) or reaction of III and (BCO)2O or BCOD (D = halo, OH, alkoxy). Treatment of 2.4 g 2,4-Cl2C6H3COCH(CO2Me)COCHMeSAc with 5% NaOH (0.51 g NaOH) gave 0.4 g I (X = S; A = MeCH; R1 = H,; B = 2,4-Cl2C6H3), which at 10 g/are showed 100% control of Cyperus difformis and Sagittaria trifolia and no damage to rice. A wettable powder was formulated contg. I (X = S; A = CH2; R1 = H; B = Ph) 20, white carbon 20, kieselguhr 52, and Na alkyl sulfate 8 parts.

IT **10296-64-7P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide**)

RN 10296-64-7 CAPLUS

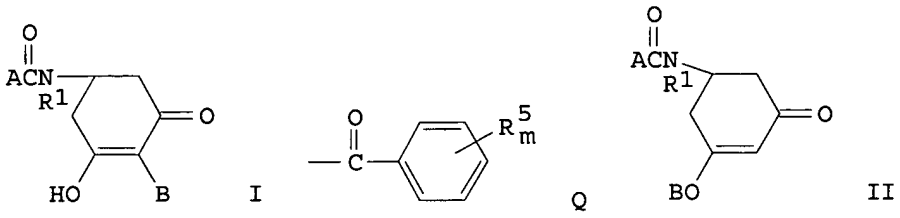
CN 2(5H)-Thiophenone, 3-benzoyl-4-hydroxy- (8CI, 9CI) (CA INDEX NAME)



L7 ANSWER 133 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1988:585478 CAPLUS
DOCUMENT NUMBER: 109:185478
TITLE: Preparation of novel cyclohexanediones as **herbicides**
INVENTOR(S): Brunner, Hans Georg
PATENT ASSIGNEE(S): Ciba-Geigy A.-G., Switz.
SOURCE: Eur. Pat. Appl., 48 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 278907	A1	19880817	EP 1988-810062	19880203
EP 278907	B1	19910529		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
AT 63901	E	19910615	AT 1988-810062	19880203
ES 2045177	T3	19940116	ES 1988-810062	19880203
DK 8800617	A	19880810	DK 1988-617	19880208
AU 8811386	A1	19880811	AU 1988-11386	19880208
AU 613008	B2	19910725		
ZA 8800850	A	19881026	ZA 1988-850	19880208
US 4872902	A	19891010	US 1988-153376	19880208
JP 63201152	A2	19880819	JP 1988-28636	19880209
BR 8800531	A	19880927	BR 1988-531	19880209
PRIORITY APPLN. INFO.:			CH 1987-469	19870209
			EP 1988-810062	19880203

OTHER SOURCE(S): MARPAT 109:185478
GI

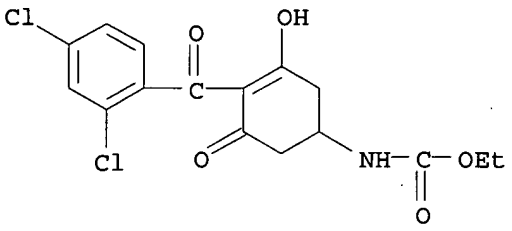


AB The cyclohexanediones I (R1 = H, alkyl; A = R2, OR3, NR3R4; R2 = cycloalkyl, alkyl, alkoxyalkyl, haloalkyl; R3 = alkyl, Ph, benzyl, cycloalkyl, R5-substituted Ph or benzyl; R4 = H, alkyl, alkoxy, cycloalkyl; NR3R4 = pyrrolidino, morpholino, piperidino; B = Q, R6CO, CR6:NOR7; n = 0-3; R5 = halo, NO2, CN, alkyl, alkoxy, alkylthio, haloalkyl, alkylsulfinyl, alkylsulfonyl; R6 = alkyl, cycloalkyl; R7 = H, alkyl, haloalkyl, alkenyl, haloalkenyl, alkynyl) are prepd. as **herbicides** and **plant** growth regulators. Also prepd. are II, as intermediates for I synthesis. I (B = R1 = H, A = NMe2) was reacted with EtCOCl in Et3N-contg. EtOAc, for 15 h, to give II (B = EtCO, R1 = H, A = NMe2), which upon treatment with 4-dimethylaminopyridine in dichloroethane was rearranged into I (B = EtCO, R1 = H, A = NMe2). In simulated rice paddy, pre-emergence I (A = OEt, B = PrCO, R1 = H) (0.5-4 kg/ha) controlled Echinochloa crus-galli and Monochoria vaginalis. Granules comprised 5% I, 94% kaolin, and 1% SiO2.

IT **117107-79-6P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of, as **herbicide** and **plant** growth regulator)

RN 117107-79-6 CAPLUS

CN Carbamic acid, [4-(2,4-dichlorobenzoyl)-3-hydroxy-5-oxo-3-cyclohexen-1-yl]-, ethyl ester (9CI) (CA INDEX NAME)



L7 ANSWER 134 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1988:437606 CAPLUS

DOCUMENT NUMBER: 109:37606

TITLE: Herbicidal 3-(substituted oxy)-2-benzoylcyclohex-2-enones, their formulations, and processes for their preparation

INVENTOR(S): Knudsen, Christopher Glade; Michaely, William James

PATENT ASSIGNEE(S): Stauffer Chemical Co., USA

SOURCE: Eur. Pat. Appl., 15 pp.
CODEN: EPXXDW

DOCUMENT TYPE: Patent

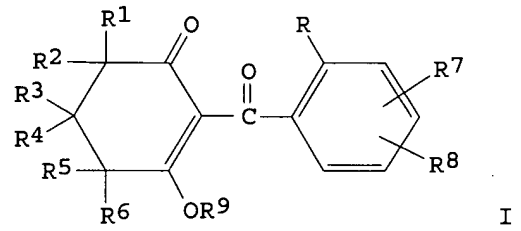
LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 253124	A2	19880120	EP 1987-108077	19870604
EP 253124	A3	19880706		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, NL				
US 4918236	A	19900417	US 1986-871989	19860609
AU 8773447	A1	19871210	AU 1987-73447	19870527
DK 8702909	A	19871210	DK 1987-2909	19870604
FI 8702545	A	19871210	FI 1987-2545	19870608
HU 43918	A2	19880128	HU 1987-2615	19870608
ZA 8704096	A	19880525	ZA 1987-4096	19870608
JP 63002947	A2	19880107	JP 1987-142406	19870609
CN 87104115	A	19880120	CN 1987-104115	19870609
BR 8702906	A	19880308	BR 1987-2906	19870609
US 4957540	A	19900918	US 1989-453432	19891219

PRIORITY APPLN. INFO.: US 1986-871989 19860609
OTHER SOURCE(S): CASREACT 109:37606; MARPAT 109:37606
GI



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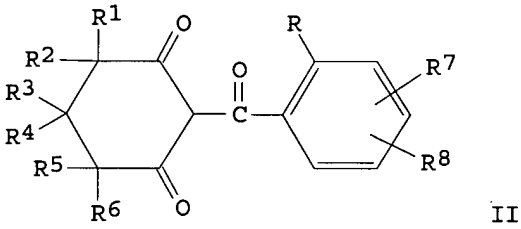


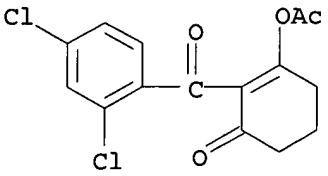
II

AB Title compds. I [R = halo, NO2, cyano, C1-2 alkyl, alkoxy, haloalkyl, RaSOm (m = 0, 2; Ra = C1-2 alkyl); R1-R6 = H, C1-4 alkyl; R1R2, R5R6 = C2-5 alkylene; R3R4 = O; R7, R8 = H, halo, CF3O, cyano, NO2, C1-4 alkyl, alkoxy, haloalkyl, RbSOn (n = 0-2; Rb = C1-4 alkyl, haloalkyl, cyanoalkyl, Ph, PhCH2), NRcRd (Rc, Rd = H, C1-4 alkyl), ReCO (Re = C1-4 alkyl, alkoxy), SO2NRcRd, NRcCORd; R9 = C4-6 cycloalkyl, PhCH2, C3-6 alkenyl, (un)substituted C1-6 alkyl, PhSO2, alkanesulfonyl, PhCO, C2-7 alkanoyl], useful as **herbicides**, are prepd. from benzoylcyclohexanediones II. A suspension of II (R = Cl, R1-R7 = H, R8 = 4-Cl) in anhyd. Et2O was treated slowly with CH2N2 (generated from Diazald) at 0.degree. to give 35% I (R = Cl, R1-R7 = H, R8 = 4-Cl, R9 = Me) (III). At 4 lb/acre (preemergence) in the greenhouse, III completely controlled 5 out of 7 std. weeds. A flowable formulation contains I 45, polyoxyethylene ether 5, attagel 0.05, propylene glycol 10, 1,2-benzisothiazolin-3-one 0.03, silicone defoamer 0.02, and H2O 39.9%.

IT **115128-95-5P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)

09/ 943,037

(prepn. of, as **herbicide**)
RN 115128-95-5 CAPLUS
CN 2-Cyclohexen-1-one, 3-(acetyloxy)-2-(2,4-dichlorobenzoyl)- (9CI) (CA INDEX NAME)



L7 ANSWER 135 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1988:406220 CAPLUS
DOCUMENT NUMBER: 109:6220
TITLE: Preparation and formulation of herbicidal 3-amino-2-benzoyl-2-cyclohexen-1-ones
INVENTOR(S): Knudsen, Christopher Glade
PATENT ASSIGNEE(S): Stauffer Chemical Co., USA
SOURCE: Eur. Pat. Appl., 26 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 249813	A1	19871223	EP 1987-108081	19870604
EP 249813	B1	19910724		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, NL				
US 4775411	A	19881004	US 1986-872079	19860609
DK 8702904	A	19871210	DK 1987-2904	19870604
DK 171529	B1	19961223		
AT 65492	E	19910815	AT 1987-108081	19870604
ES 2044868	T3	19940116	ES 1987-108081	19870604
AU 8773886	A1	19871210	AU 1987-73886	19870605
AU 592873	B2	19900125		
FI 8702548	A	19871210	FI 1987-2548	19870608
FI 86414	B	19920515		
FI 86414	C	19920825		
HU 44396	A2	19880328	HU 1987-2611	19870608
HU 204165	B	19911230		
ZA 8704098	A	19880330	ZA 1987-4098	19870608
IL 82798	A1	19910512	IL 1987-82798	19870608
CA 1291756	A1	19911105	CA 1987-539096	19870608
CZ 282129	B6	19970514	CZ 1987-4193	19870608
SK 278924	B6	19980408	SK 1987-4193	19870608
JP 62298563	A2	19871225	JP 1987-142404	19870609
JP 2509623	B2	19960626		
CN 87104123	A	19880120	CN 1987-104123	19870609
BR 8702902	A	19880308	BR 1987-2902	19870609
PL 152003	B1	19901031	PL 1987-266144	19870609

PRIORITY APPLN. INFO.: US 1986-872079 19860609
EP 1987-108081 19870604
OTHER SOURCE(S): CASREACT 109:6220
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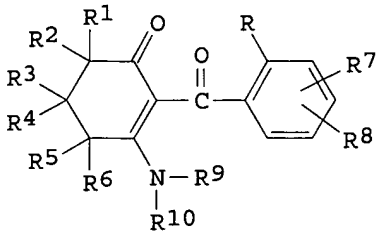

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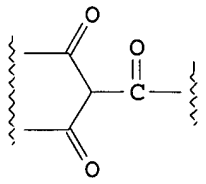

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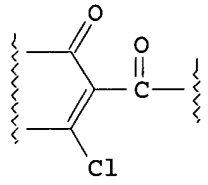


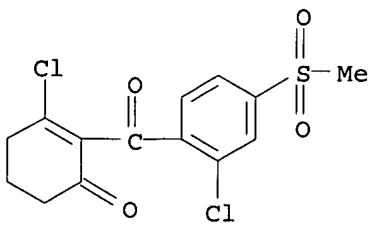
III

AB Title compds. I [R = halo, NO2, cyano, C1-12 alkyl, alkoxy, haloalkyl, RaSOn (Ra = C1-2 alkyl; n = 0, 2); R1-R6 = H, C1-4 alkyl; R1R2, R5R6 = C2-5 alkylene; R3R4 = O; R7, R8 = H, halo, CF3O, cyano, NO2, C1-4 alkyl, alkoxy, haloalkyl, RbSOn (Rb = C1-4 alkyl, haloalkyl, cyanoalkyl, Ph, PhCH2; n = 0-2), NRcRd (Rc, Rd = H, C1-4 alkyl), ReCO (Re = C1-4 alkyl, alkoxy), SO2NRcRd, NRcCORd; R9 = H, C1-4 alkyl; R10 = H, C4-6 cycloalkyl, C1-6 alkoxy, PhCH2, PhCH2CH2, C2-5 alkanoyl, alkoxycarbonyl, C2-6 alkenyl, alkynyl, (un)substituted C1-6 alkyl, Ph; NR9R10 = heterocyclyl contg. 0-2 addnl. N, S, or O atoms], useful as **herbicides**, are prepd. via intermediate cyclohexanediones II and chlorocyclohexenones III. Acylation of 1,3-cyclohexanedione by 2-chloro-4-(methylsulfonyl)benzoyl chloride in CH2Cl2 contg. Et3N, followed by rearrangement of the resultant enol ester in MeCN contg. Et3N and Me2C(OH)CN, gave II (R = Cl, R1-R7 = H, R8 = 4-MeSO2). This was treated with ClCOCOCl in CH2Cl2 and DMF catalyst to give 70% III (R's as given), which was treated with MeONHMe.cntdot.HCl and Et3N in THF to give 27% I (R = Cl, R1-R7 = H, R8 = 4-MeSO2, R9 = Me, R10 = OMe) (IV). At 4 lb/acre preemergence, IV completely killed 6 of 7 tested weeds. A granular formulation contains I 10, lignin sulfonate 5, and CaCO3 85%.

IT **114911-84-1P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and aminolysis of)

RN 114911-84-1 CAPLUS

CN 2-Cyclohexen-1-one, 3-chloro-2-[2-chloro-4-(methylsulfonyl)benzoyl]- (9CI) (CA INDEX NAME)



L7 ANSWER 136 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1988:406219 CAPLUS
DOCUMENT NUMBER: 109:6219
TITLE: Preparation and formulation of herbicidal

09/ 943,037

3-(substituted thio)-2-benzoyl-2-cyclohexen-1-ones

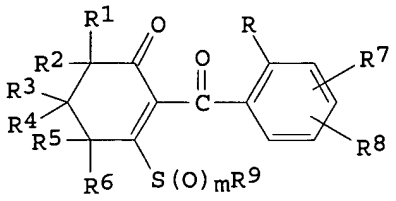
INVENTOR(S): Knudsen, Christopher Glade
PATENT ASSIGNEE(S): Stauffer Chemical Co., USA

SOURCE: Eur. Pat. Appl., 21 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 249150	A1	19871216	EP 1987-108080	19870604
EP 249150	B1	19910529		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, NL				
US 4762551	A	19880809	US 1986-872078	19860609
DK 8702906	A	19871210	DK 1987-2906	19870604
AU 8773887	A1	19871210	AU 1987-73887	19870605
AU 595608	B2	19900405		
FI 8702547	A	19871210	FI 1987-2547	19870608
HU 43919	A2	19880128	HU 1987-2616	19870608
HU 205827	B	19920728		
ZA 8704095	A	19880330	ZA 1987-4095	19870608
CA 1292750	A1	19911203	CA 1987-539097	19870608
JP 62292755	A2	19871219	JP 1987-142405	19870609
JP 2502311	B2	19960529		
CN 87104124	A	19880210	CN 1987-104124	19870609
BR 8702901	A	19880301	BR 1987-2901	19870609
US 4837352	A	19890606	US 1988-171358	19880321
US 4854966	A	19890808	US 1988-171077	19880321

PRIORITY APPLN. INFO.: US 1986-872078 19860609
OTHER SOURCE(S): CASREACT 109:6219

GI



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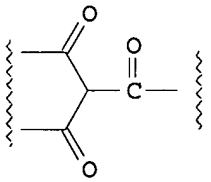
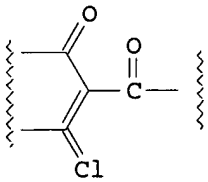


II



III

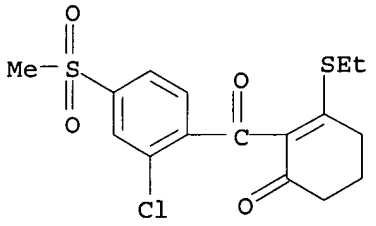
AB Title compds. I [R = halo, NO2, cyano, C1-2 alkyl, alkoxy, haloalkyl, RaSOn (Ra = C1-2 alkyl; n = 0, 2); R1-R6 = H, C1-4 alkyl; R1R2, R5R6 = C2-5 alkylene; R3R4 = O; R7, R8 = H, halo, CF3O, cyano, NO2, C1-4 alkyl, alkoxy, haloalkyl; RbSOn (Rb = C1-4 alkyl, haloalkyl, cyanoalkyl, Ph, PhCH2; n = 0-2), NRcRd (Rc, Rd = H, C1-4 alkyl), ReCO (Re = C1-4 alkyl, alkoxy), SO2NRcRd, NRcCORd; R9 = C1-4 alkyl, (un)substituted Ph, cyano, (CH2)xCO2R10 (R10 = C1-4 alkyl; x = 1-3); m = 0-2], useful as **herbicides**, are prepd. via intermediate cyclohexanediones II and

chlorocyclohexenones III. Acylation of 1,3-cyclohexanedione by 2-chloro-4-(methylsulfonyl)benzoyl chloride in CH2Cl2 contg. Et3N gave the corresponding enol ester, which was isomerized by stirring in MeCN contg. Et3N and Me2C(OH)CN. The resultant II (R = Cl, R1-R7 = H, R8 = 4-MeSO2) was treated with ClCOCOCl and DMF in CH2Cl2 to give 70% of the corresponding III, which reacted with EtSH in THF contg. Et3N to give 65% I (R9 = Et, m = 0, others as above). Oxidn. of the sulfide with 3-ClC6H4C(O)OOH in CH2Cl2 at 0.degree. gave I (R = Cl, R1-R7 = H, R8 = 4-MeSO2, R9 = Et, m = 2) (IV). At 4 lb/acre pre- or postemergence, IV completely controlled 5 of 7 tested weeds. A wettable powder contains I 3-90, wetting agent 0.5-2, dispersing agent 1-8, and diluent(s) 8.5-87%.

IT **114912-21-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and oxidn. of)

RN 114912-21-9 CAPLUS

CN 2-Cyclohexen-1-one, 2-[2-chloro-4-(methylsulfonyl)benzoyl]-3-(ethylthio)-(9CI) (CA INDEX NAME)



L7 ANSWER 137 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1988:203575 CAPLUS

DOCUMENT NUMBER: 108:203575

TITLE: A process for the extraction of garcinol, hydroxycitric acid, and anthocyanins which are useful in the food industry as coloring additives from the **plant** kokum(Garcinia indica)

INVENTOR(S): Krishnamurthy, Nanjundaiah; Ravindranath, Bhagavathula; Sampathu, Satyagalam Ranganatha

PATENT ASSIGNEE(S): Council of Scientific and Industrial Research (India), India

SOURCE: Indian, 9 pp.
CODEN: INXXAP

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
IN 160753	A	19870801	IN 1985-DE247	19850323

PRIORITY APPLN. INFO.: IN 1985-DE247 19850323

AB Dried powd. kokum fruit rind is treated with water to obtain a water ext. contg. hydroxycitric acid and anthocyanins, which are sepd. by fractional chromatog.; further treatment of the rind residue with an org. solvent is performed to ext. the garcinol. Dry 10-40 mesh kokum was extd. with 3 parts H2O contg. 250-1000 ppm SO2, the ext. vacuum concd. and then air-dried on sand and placed in a column from which hydroxycitric acid was eluted with acetone contg. 1-5% H2O. The anthocyanins were then eluted with H2O. The residue was cold-extd. with 4 parts EtOH, concd. to a 2-phase system, the upper phase contg. anthocyanins being added to the above anthocyanin ext. and the lower phase digested into hexane or

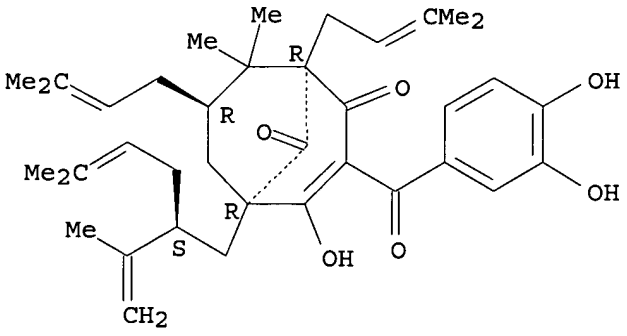
petroleum ether at 60-80.degree.. On standing at 6.degree. for 48-72 h, garcinol is crystd. from this ext. The garcinol is chromatog. purified.

IT **78824-30-3**, Garcinol
RL: PROC (Process)
(extn. of, from kokum fruit rind)

RN 78824-30-3 CAPLUS

CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L7 ANSWER 138 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1988:260 CAPLUS

DOCUMENT NUMBER: 108:260

TITLE: Structure and chemotherapeutical activity of a polyisoprenylated benzophenone from the stem bark of Garcinia huillensis

AUTHOR(S): Bakana, Phongi; Claeys, Magda; Totte, Jozef; Pieters, Luc A. C.; Van Hoof, Lucia; Tamba-Vemba; Van den Berghe, Dirk A.; Vlietinck, Arnold J.

CORPORATE SOURCE: Ec. Pharm., Univ. Kinshasa, Kinshasa, Zaire

SOURCE: Journal of Ethnopharmacology (1987), 21(1), 75-84
CODEN: JOETD7; ISSN: 0378-8741

DOCUMENT TYPE: Journal

LANGUAGE: English

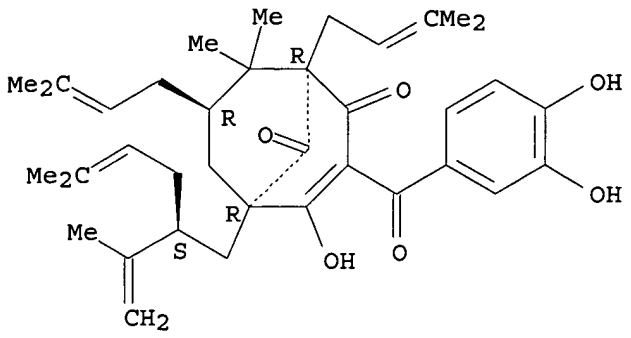
AB The stem bark of G. huillensis grown in Zaire and used in central-African traditional medicine was subjected to a bioassay-guided fractionation. The chemotherapeutically active petroleum ether ext. afforded fatty acids, aliph. alcs., triterpenes and a polyisoprenylated benzophenone, identified as garcinol (camboginol). This compd. exhibited activity against gram-pos. and gram-neg. cocci, mycobacteria and fungi. Garcinol was inactive against gram-neg. enteric bacilli, yeasts and viruses.

IT **78824-30-3**, Garcinol
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)
(of Garcinia huillensis stem barks, antimicrobial activity of)

RN 78824-30-3 CAPLUS

CN Bicyclo[3.3.1]non-3-ene-2,9-dione, 3-(3,4-dihydroxybenzoyl)-4-hydroxy-8,8-dimethyl-1,7-bis(3-methyl-2-butenyl)-5-[(2S)-5-methyl-2-(1-methylethenyl)-4-hexenyl]-, (1R,5R,7R)- (9CI) (CA INDEX NAME)

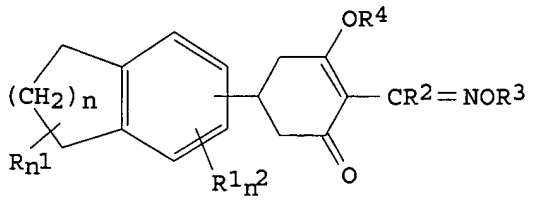
Absolute stereochemistry.



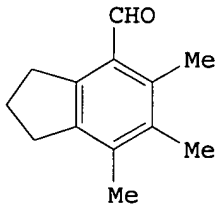
L7 ANSWER 139 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1984:156380 CAPLUS
DOCUMENT NUMBER: 100:156380
TITLE: Cyclohexanedione derivatives, their use as **herbicides** and herbicidal compositions containing them
INVENTOR(S): Serban, Alexander; Watson, Keith Geoffrey; Bird, Graham John; Cross, Lindsay Edwin; Farquharson, Graeme John
PATENT ASSIGNEE(S): ICI Australia Ltd. , Australia
SOURCE: Eur. Pat. Appl., 136 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 86588	A2	19830824	EP 1983-300491	19830131
EP 86588	A3	19831116		
EP 86588	B1	19870701		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
AU 8311638	A1	19830818	AU 1983-11638	19820212
AU 553909	B2	19860731		
ZA 8300603	A	19840328	ZA 1983-603	19830128
AT 28073	E	19870715	AT 1983-300491	19830131
HU 31629	O	19840528	HU 1983-441	19830209
HU 189228	B	19860630		
JP 58159438	A2	19830921	JP 1983-19909	19830210
JP 07002700	B4	19950118		
BR 8300704	A	19831116	BR 1983-704	19830210
DK 8300594	A	19830813	DK 1983-594	19830211
ES 519709	A1	19840316	ES 1983-519709	19830211
CA 1203546	A1	19860422	CA 1983-421422	19830211
JP 05331094	A2	19931214	JP 1992-236134	19920903
JP 06072119	B4	19940914		

PRIORITY APPLN. INFO.: AU 1982-2693 19820212
AU 1982-4686 19820702
EP 1983-300491 19830131
OTHER SOURCE(S): CASREACT 100:156380
GI



I



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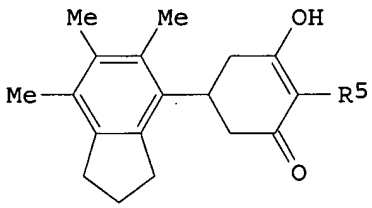


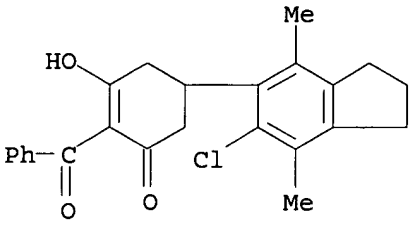
III

AB Title compds. I [R = alkyl, alkenyl, alkynyl; R1 = NO2, cyano, OH, halogen, alkoxycarbonyl, (CH2)2-5, alkylthio, alkylsulfinyl, alkylsulfonyl, (un)substituted alkyl, alkoxy, sulfamoyl, benzyloxy, amino, alkanoyl; R2 = alkyl, fluoroalkyl, alkenyl, alkynyl, Ph; R3 = (un)substituted alkyl, alkenyl, alkynyl; R4 = H, (un)substituted alkyl, alkylsulfonyl, benzenesulfonyl; n, n2 = 0-3; n1 = 0-4) were prepd. Thus indene deriv. II was condensed with Me2CO and (EtO2C)CH2 to give indanylcyclohexenone III (R5 = H) which was acylated to give III (R5 = COPr). The last was treated with HONH2 to give III (R5 = CEt:NOEt)(IV). IV gave complete kill of Digitaria sanguinalis at 0.025 kg/ha postemergent but .ltoreq.10% damage of rice.

IT **88633-70-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and reaction of, with oxyamine)

RN 88633-70-9 CAPLUS

CN 2-Cyclohexen-1-one, 2-benzoyl-5-(6-chloro-2,3-dihydro-4,7-dimethyl-1H-inden-5-yl)-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 140 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1982:455364 CAPLUS

DOCUMENT NUMBER: 97:55364

TITLE: Cyclohexane derivatives

PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.
CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

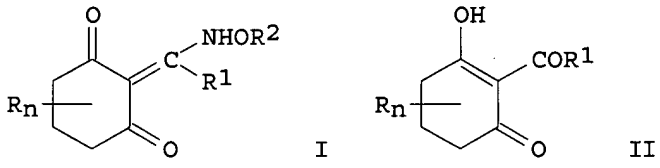
PATENT INFORMATION:

09/ 943,037

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 57045143	A2	19820313	JP 1981-63094	19810425
JP 58038419	B4	19830823		

PRIORITY APPLN. INFO.: JP 1981-63094 19810425

GI



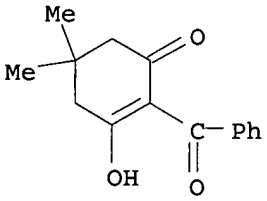
I II

AB Cyclohexanediones (I; R = alkyl, alkenyl, aryl, etc.; R1 = H, aryl; R2 = alkyl, alkenyl, alkynyl), effective **herbicides** at 50-200 g/10 a, were prepd. Thus, refluxing 0.006 mol EtONH2 with 0.005 mol II (Rn = 5,5-Me2, R1 = Ph) in EtOH gave 85% I (Rn = 5,5-Me2, R1 = Ph, R2 = Et). Similarly prepd. were 2 addnl. I (Rn = 5,5-Me2; R1 = H, Ph; R2 = allyl).

IT **55847-93-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(condensation of, with alkyl- or alkenylhydroxylamines)

RN 55847-93-3 CAPLUS

CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 141 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1980:620422 CAPLUS

DOCUMENT NUMBER: 93:220422

TITLE: Cyclohexanediones

PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan

SOURCE: Jpn. Tokkyo Koho, 9 pp.
CODEN: JAXXAD

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 55019209	B4	19800524	JP 1977-92219	19770802

PRIORITY APPLN. INFO.: JP 1977-92219 19770802

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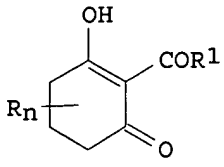

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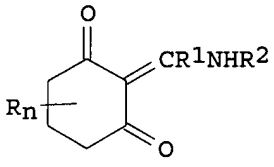


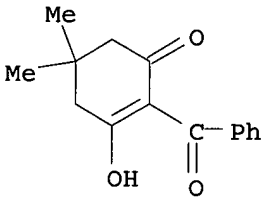
II

AB Hydroxyacylcyclohexenones I (R = alkyl, Ph, furyl, tetrahydrobenzo; n = 0, 1, 2; R1 = alkyl, Ph) were treated with amines R2NH2 (R2 = H, alkyl, alkenyl, Ph, halophenyl, benzyl) to give II. II are **herbicides**. Thus, stirring I (Rn = 5,5-Me2; R1 = Ph) in EtOH with 40% aq. MeNH2 2 h at room temp. gave 68% corresponding II.

IT **55847-93-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, with methylamine)

RN 55847-93-3 CAPLUS

CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 142 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1980:580895 CAPLUS

DOCUMENT NUMBER: 93:180895

TITLE: Induction of parthenocarpic fruits. I. Effect of naphthoquinone derivatives, 2-benzimidoyl-3-hydroxy-1,4-naphthoquinone on the growth of tomato

AUTHOR(S): Yukinaga, Hisajiro; Ogata, Masaru; Hirabayashi, Masao; Takahashi, Tetsuya; Miki, Nobuo

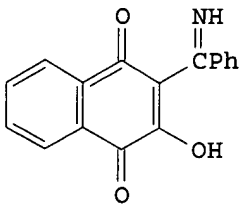
CORPORATE SOURCE: Aburahi Lab., Shionogi and Co. Ltd., Koka, Japan

SOURCE: Journal of the Japanese Society for Horticultural Science (1979), 48(3), 309-21
CODEN: EGKZA9; ISSN: 0013-7626

DOCUMENT TYPE: Journal

LANGUAGE: Japanese

GI



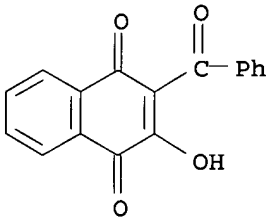
I

AB Among 30 synthetic naphthoquinone derivs. tested for parthenocarpy of

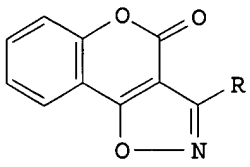
dwarf tomato 2-benzimidoyl-3-hydroxy-1,4-naphthoquinone (I) [37911-06-1], 3-phenyl-4,9-dihydronaphtho[2,3-d]isoxazole-4,9-dione [21474-24-8], 2-(4-methoxybenzimidoyl)-3-hydroxy-1,4-naphthoquinone [37911-08-3], 2-(N-methylbenzimidoyl)-3-hydroxy-1,4-naphthoquinone [38997-76-1], 3,5'-diphenyl-4,9-dihydronaphtho[2,3-d]isoxazole-9-spiro-2'-1',3',4'-dioxazole-4-one [21474-23-7], and 3,5'-diphenyl-4,5-dihydronaphtho[2,1-d]isoxazole-5-spiro-2'-1',3',4'-dioxazole-4-one [23767-17-1] were effective at 50-250 ppm, 2-benzoyl-3-hydroxy-1,4-naphthoquinone [**41695-65-2**] and 6-(or 7-)benzimidoyl-7(or 6)-hydroxy-5,8-dihydroquinoline-5,8-dione [39045-64-2] were effective at 100-250 and 50-100 ppm, resp., and 2-(3-pyridylcarbimidoyl)-3-hydroxy-1,4-naphthoquinone [37911-09-4] and 2-(4-chlorobenzimidoyl)-3-hydroxy-6,7-dimethyl-1,4-naphthoquinone [37911-10-7] were effective at 250 ppm, to induce parthenocarpic fruits at 3.3-75% yield. When 25-500 ppm I with 100 ppm Tween 20 were applied to emasculated Fukuju No. 2 tomato flowers, parthenocarpic fruits were induced at yields of 52.4 (25 ppm)-96.0% (250 ppm), while 100 ppm 4-chloro-2-hydroxymethylphenoxyacetic acid (HCPA) [6386-63-6] induced 88% parthenocarpy. Both these fruits were completely seedless. The ovule development of parthenocarpic fruits induced by I and HCPA was obsd. histol. Since I was not easily sol. in H25O, it was formulated as wettable powder. When it was applied to tomato, cultivar Beiju, flowers, av. fruit set percentage and total yield per **plant** at 200 and 300 ppm I were similar to those at 200 ppm HCPA and 30 ppm 4-chlorophenoxyacetic acid [122-88-3] . The way of application of I was discussed.

IT **41695-65-2**
RL: BIOL (Biological study)
(parthenocarpy induction by, in tomato)

RN 41695-65-2 CAPLUS
CN 1,4-Naphthalenedione, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 143 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1977:584412 CAPLUS
DOCUMENT NUMBER: 87:184412
TITLE: Synthesis of benzopyrano[3,4-d]isoxazoles
AUTHOR(S): Desai, M. K.; Usgaonkar, R. N.
CORPORATE SOURCE: Dep. Org. Chem., Inst. Sci., Bombay, India
SOURCE: Indian Journal of Chemistry, Section B: Organic Chemistry Including Medicinal Chemistry (1977), 15B(4), 379-81
CODEN: IJSBDB; ISSN: 0376-4699
DOCUMENT TYPE: Journal
LANGUAGE: English
GI



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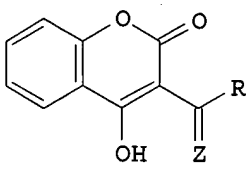


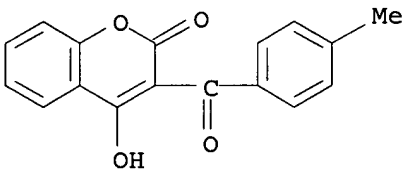
II, Z=O
III, Z=NOH

AB Benzopyranoisoxazoles I (R = Me, Et, Ph, o-tolyl, p-tolyl) were prepd. by refluxing coumarins II with NH2OH in EtOH. The reaction of II (R = Me, Et) with NH2OH at room temp. gave the oximes III (R = Me, Et). No III could be isolated in the reaction of II (R = Ph; o-, p-tolyl) with NH2OH. I (R = Me, Ph) were neither fungicidal nor bactericidal.

IT **64517-74-4P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and cyclization of, benzopyranoisoxazole deriv. from)

RN 64517-74-4 CAPLUS

CN 2H-1-Benzopyran-2-one, 4-hydroxy-3-(4-methylbenzoyl)- (9CI) (CA INDEX NAME)



L7 ANSWER 144 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1977:405721 CAPLUS
DOCUMENT NUMBER: 87:5721
TITLE: Quinone derivatives
INVENTOR(S): Yukinaga, Hisajiro; Ogata, Masaru; Kano, Hideo
PATENT ASSIGNEE(S): Shionogi and Co., Ltd., Japan
SOURCE: S. African, 37 pp.
CODEN: SFXXAB
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
ZA 7506575	A	19760929	ZA 1975-6575	19751017

PRIORITY APPLN. INFO.: ZA 1975-6575 19751017
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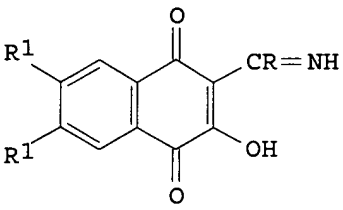


I

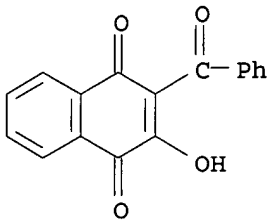
09/ 943,037

AB Imidoylnaphthoquinones I (R = Ph, 4-MeC6H4, Me, 3-pyridyl, 4-MeOC6H4, 4-ClC6H4, R1 = H; R = 4-ClC6H4, 2,4-Cl2C6H3, R1 = Me; R = Ph, R1 = OMe) were prepd. by photolysis or Raney Ni redn. of naphthisoxazolediones. I stimulated parthenocarpy. Thus, Fukuju No. 2 tomato **plants** treated with 250 .mu.g/mL I (R = Ph, R1 = H) showed fruit set in 96% of the flowers treated.

IT **41695-65-2**
RL: RCT (Reactant); RACT (Reactant or reagent)
(amination of)

RN 41695-65-2 CAPLUS

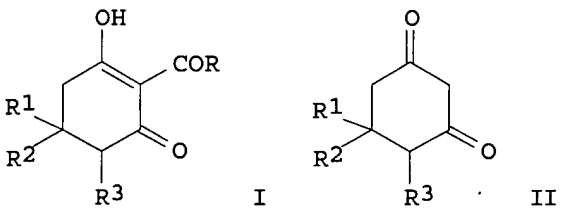
CN 1,4-Naphthalenedione, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 145 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1977:405499 CAPLUS
DOCUMENT NUMBER: 87:5499
TITLE: Insecticidal and acaricidal cyclohexenes
INVENTOR(S): Ando, Meiki; Tashiro, Mitsunobu; Sato, Mikio; Iwataki, Misao
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 5 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 51125738	A2	19761102	JP 1974-98909	19740830

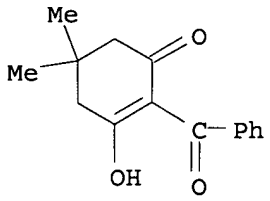
PRIORITY APPLN. INFO.: JP 1974-98909 19740830
GI



AB **Insecticides** and acaricides contg. cyclohexene derivs. I (R = alkyl, aryl, alkylamino; R1, R2 = H, alkyl, Ph, 2-furyl, 2-thienyl; R3 = H, halo, alkoxy carbonyl, CN) were prepd. by acylation or aroylation of the cyclohexanedione derivs. II. Among 21 I prepd., 14 were effective against citrus mites as 500 ppm spray.

IT **55847-93-3P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic

preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. and insecticidal activity of)
RN 55847-93-3 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 146 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1977:189315 CAPLUS
DOCUMENT NUMBER: 86:189315
TITLE: Cyclohexanediones
INVENTOR(S): Sawaki, Mikio; Makizawa, Shigeo; Hirono, Yoshihiko; Ishikawa, Hisao
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 7 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 51125040	A2	19761101	JP 1974-96199	19740823
JP 57047882	B4	19821013		

PRIORITY APPLN. INFO.: JP 1974-96199 19740823
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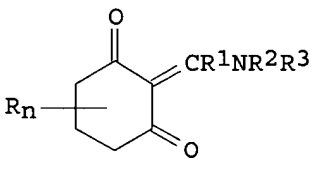

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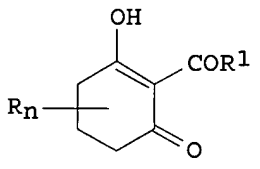

II

AB Herbicidal cyclohexanediols I [R = alkyl, Ph, furyl, thienyl, 5,6-tetramethylene; n = 0-6; R1 = alkyl, (substituted) Ph; R2, R3 = H, alkyl, alkenyl, (substituted) Ph] were prepd. by reaction of II with R2R3NH. Thus, a mixt. of 1.3 g 2-benzoyl-3-hydroxy-5,5-dimethyl-2-cyclohexen-1-one and 0.5 g 40% aq. MeNH2 in EtOH was treated 2 h at room temp. to give 68% 5,5-dimethyl-2-(.alpha.-methylaminobenzylidene)cyclohexane-1,3-dione. Analogously prepd. were 2-(1-methylaminobutylidene)-5-isopropylcyclohexane-1,3-dione (III), 2-(1-N-methylaminopropylidene)-5-(2-furyl)cyclohexane-1,3-dione, 2-(1-N-methylaminopropylidene)decalin-1,3-dione, and 2-(1-N-benzylaminopropylidene)-5,5-dimethylcyclohexane-1,3-dione. Herbicidal data of III were given against Digitaria adscendens and Chenopodium album.
IT **55847-93-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, with amines)

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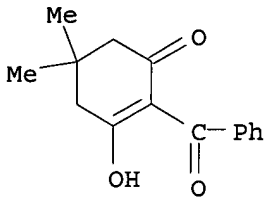
RN 55847-93-3 CAPLUS
CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 147 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1977:116065 CAPLUS
DOCUMENT NUMBER: 86:116065
TITLE: **Plant** growth regulating agents
INVENTOR(S): Yukinaga, Toshijiro; Kano, Hideo; Ogata, Hide
PATENT ASSIGNEE(S): Shionogi and Co., Ltd., Japan
SOURCE: Jpn. Tokkyo Koho, 9 pp.
CODEN: JAXXAD
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

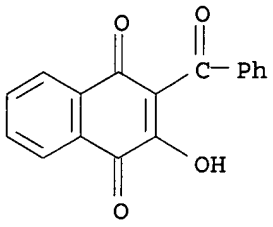
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 51009807	B4	19760330	JP 1971-19410	19710331
JP 50028430	B4	19750916	JP 1971-5389	19710209
JP 50030067	B4	19750929	JP 1971-5390	19710209
US 3835168	A	19740910	US 1972-220708	19720125
CA 978957	A1	19751202	CA 1972-133828	19720203
AU 7238748	A1	19730809	AU 1972-38748	19720207
AT 311718	B	19731126	AT 1972-968	19720207
FR 2126785	A5	19721006	FR 1972-4165	19720208
IT 949036	A	19730611	IT 1972-67377	19720208
GB 1336973	A	19731114	GB 1972-5831	19720208
SE 381462	B	19751208	SE 1972-1462	19720208
CH 572900	A	19760227	CH 1972-1775	19720208
SU 518102	D	19760615	SU 1972-1745902	19720208
NL 7201686	A	19720811	NL 1972-1686	19720209
DE 2206114	A	19720824	DE 1972-2206114	19720209
DE 2206114	B2	19800731		
DE 2206114	C3	19810402		
DK 142314	B	19801013	DK 1972-582	19720209
DK 142314	C	19810309		
US 3865835	A	19750211	US 1973-419971	19731129
US 3933828	A	19760120	US 1973-419970	19731129

PRIORITY APPLN. INFO.:
JP 1971-5389 A 19710209
JP 1971-5390 A 19710209
JP 1971-5393 A 19710209
JP 1971-19410 A 19710331
US 1972-220708 A3 19720125

GI For diagram(s), see printed CA Issue.
AB The naphthoquinones I (A = benzene or pyridine; R1 = lower alkyl, Ph, chlorophenyl, alkylphenyl, alkoxyphenyl, or 3-pyridyl; X = oxo or alkylimino) are synthesized and are used as **herbicides** and **plant** growth regulators. Thus, 2-benzimidoyl-3-hydroxy-1,4-naphthoquinone (II) [37911-06-1] was synthesized by redn. of 3-phenyl-4,9-dihydronaphtho[2,3-d]isooxazole-4,9-dione [21474-24-8].

Application of 40% II/are to soils completely controlled weeds such as Monochoria vaginalis and Rotala indica.

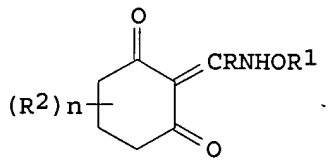
IT **41695-65-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. and herbicidal and **plant** growth regulating activity of)
RN 41695-65-2 CAPLUS
CN 1,4-Naphthalenedione, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



L7 ANSWER 148 OF 149 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1976:405280 CAPLUS
DOCUMENT NUMBER: 85:5280
TITLE: 2-(Aminomethylene)-1,3-cyclohexanediones
INVENTOR(S): Sawaki, Mikio; Iwataki, Isao; Hirono, Yoshihiko; Ishikawa, Hisao
PATENT ASSIGNEE(S): Nippon Soda Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 51013750	A2	19760203	JP 1974-84632	19740725
JP 58026321	B4	19830602		

PRIORITY APPLN. INFO.: JP 1974-84632 19740725
GI



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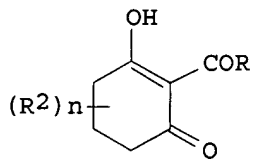
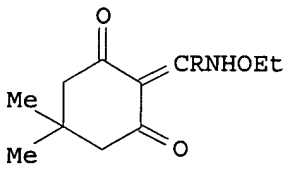


II



III

AB 1,3-Cyclohexanediones I (R = H, Ph, substituted phenyl; R1 = alkyl, alkenyl, alkynyl; R2 = alkyl, alkenyl, Ph, substituted phenyl, alkoxycarbonyl, H2NCO, cyano, halo; n = 0-6) and their metal salts were prepd. by reaction of II with R1ONH2. Thus, a mixt. of 1.2 g

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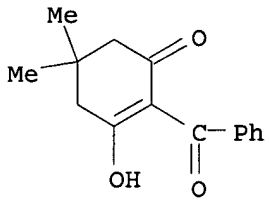
2-benzoyl-5,5-dimethyl-3-hydroxy-2-cyclohexen-1-one and 0.36 g EtONH2 in EtOH was kept 3 hr at room temp. and refluxed 10 min to give 85% III, which was tested and showed herbicidal activity.

IT **55847-93-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, with ethoxyamine)

RN 55847-93-3 CAPLUS

CN 2-Cyclohexen-1-one, 2-benzoyl-3-hydroxy-5,5-dimethyl- (9CI) (CA INDEX NAME)



L7 ANSWER 149 OF 149 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1973:159303 CAPLUS

DOCUMENT NUMBER: 78:159303

TITLE: Photochemical synthesis of 2-benzimidoyl-3-hydroxy-1,4-naphthoquinone and its analogs. New type of **plant** growth regulator

AUTHOR(S): Ogata, Masaru; Matsumoto, Hiroshi; Kano, Hideo; Yukinaga, Hisajiro

CORPORATE SOURCE: Shionogi Res. Lab., Shionogi and Co., Ltd., Osaka, Japan

SOURCE: Journal of the Chemical Society, Chemical Communications (1973), (6), 218-19
CODEN: JCCCAT; ISSN: 0022-4936

DOCUMENT TYPE: Journal

LANGUAGE: English

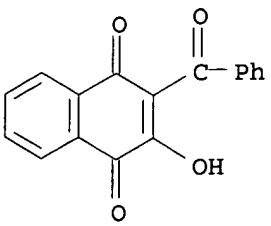
GI For diagram(s), see printed CA Issue.

AB Irradn. of the dione (I, R=Ph) in MeOH gave 71% title compd. (II, R=CPh:NH), which was hydrolyzed to II (R=COPh). Irradn. of I (R=Ph) in dioxane contg. Me2NH gave 24% II (R=CPh:NMe). II have avena section straight-growth effects at concns. 0.1-10 mg/ml and have parthenocarpy-stimulating activity in tomato and eggplant.

IT **41695-65-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of)

RN 41695-65-2 CAPLUS

CN 1,4-Naphthalenedione, 2-benzoyl-3-hydroxy- (9CI) (CA INDEX NAME)



=> d his

09/ 943,037

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L2              26 S L1
L3            2122 S L1 FUL

     FILE 'CAPLUS' ENTERED AT 12:04:48 ON 04 MAY 2003
L4             326 S L3
L5               2 S L3/ARG
L6             151 S L4 AND (HERBICIDE? OR INSECTICIDE? OR PESTICIDE? OR FUNGICIDE
L7             149 S L6 NOT L5

=> log y
COST IN U.S. DOLLARS                                SINCE FILE      TOTAL
                                                       ENTRY    SESSION
FULL ESTIMATED COST                                   701.99     850.35

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)          SINCE FILE      TOTAL
                                                       ENTRY    SESSION
CA SUBSCRIBER PRICE                                   -98.30     -98.30

STN INTERNATIONAL LOGOFF AT 12:12:02 ON 04 MAY 2003
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09/ 943,037 -- CLAIM 13

Welcome to STN International! Enter x:x

LOGINID:ssspta1202txn

PASSWORD:
TERMINAL (ENTER 1, 2, 3, OR ?):2

* * * * * * * * * * Welcome to STN International * * * * * * * * * *

NEWS	1		Web Page URLs for STN Seminar Schedule - N. America
NEWS	2	Apr 08	"Ask CAS" for self-help around the clock
NEWS	3	Jun 03	New e-mail delivery for search results now available
NEWS	4	Aug 08	PHARMAMarketLetter(PHARMAML) - new on STN
NEWS	5	Aug 19	Aquatic Toxicity Information Retrieval (AQUIRE) now available on STN
NEWS	6	Aug 26	Sequence searching in REGISTRY enhanced
NEWS	7	Sep 03	JAPIO has been reloaded and enhanced
NEWS	8	Sep 16	Experimental properties added to the REGISTRY file
NEWS	9	Sep 16	CA Section Thesaurus available in CAPLUS and CA
NEWS	10	Oct 01	CASREACT Enriched with Reactions from 1907 to 1985
NEWS	11	Oct 24	BEILSTEIN adds new search fields
NEWS	12	Oct 24	Nutraceuticals International (NUTRACEUT) now available on STN
NEWS	13	Nov 18	DKILIT has been renamed APOLLIT
NEWS	14	Nov 25	More calculated properties added to REGISTRY
NEWS	15	Dec 04	CSA files on STN
NEWS	16	Dec 17	PCTFULL now covers WP/PCT Applications from 1978 to date
NEWS	17	Dec 17	TOXCENTER enhanced with additional content
NEWS	18	Dec 17	Adis Clinical Trials Insight now available on STN
NEWS	19	Jan 29	Simultaneous left and right truncation added to COMPENDEX, ENERGY, INSPEC
NEWS	20	Feb 13	CANCERLIT is no longer being updated
NEWS	21	Feb 24	METADEX enhancements
NEWS	22	Feb 24	PCTGEN now available on STN
NEWS	23	Feb 24	TEMA now available on STN
NEWS	24	Feb 26	NTIS now allows simultaneous left and right truncation
NEWS	25	Feb 26	PCTFULL now contains images
NEWS	26	Mar 04	SDI PACKAGE for monthly delivery of multifile SDI results
NEWS	27	Mar 19	APOLLIT offering free connect time in April 2003
NEWS	28	Mar 20	EVENTLINE will be removed from STN
NEWS	29	Mar 24	PATDPAFULL now available on STN
NEWS	30	Mar 24	Additional information for trade-named substances without structures available in REGISTRY
NEWS	31	Apr 11	Display formats in DGENE enhanced
NEWS	32	Apr 14	MEDLINE Reload
NEWS	33	Apr 17	Polymer searching in REGISTRY enhanced
NEWS	34	Apr 21	Indexing from 1947 to 1956 being added to records in CA/CAPLUS
NEWS	35	Apr 21	New current-awareness alert (SDI) frequency in WPIDS/WPINDEX/WPIX
NEWS	36	Apr 28	RDISCLOSURE now available on STN

NEWS EXPRESS	April 4 CURRENT WINDOWS VERSION IS V6.01a, CURRENT MACINTOSH VERSION IS V6.0b(ENG) AND V6.0Jb(JP), AND CURRENT DISCOVER FILE IS DATED 01 APRIL 2003
NEWS HOURS	STN Operating Hours Plus Help Desk Availability
NEWS INTER	General Internet Information
NEWS LOGIN	Welcome Banner and News Items
NEWS PHONE	Direct Dial and Telecommunication Network Access to STN
NEWS WWW	CAS World Wide Web Site (general information)

09/ 943,037 -- CLAIM 13

Enter NEWS followed by the item number or name to see news on that specific topic.

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FILE 'HOME' ENTERED AT 12:21:18 ON 04 MAY 2003

=> file reg

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	0.21	0.21

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USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 2 MAY 2003 HIGHEST RN 509953-09-7
DICTIONARY FILE UPDATES: 2 MAY 2003 HIGHEST RN 509953-09-7

TSCA INFORMATION NOW CURRENT THROUGH JANUARY 6, 2003

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details:
http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

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L1 STRUCTURE UPLOADED

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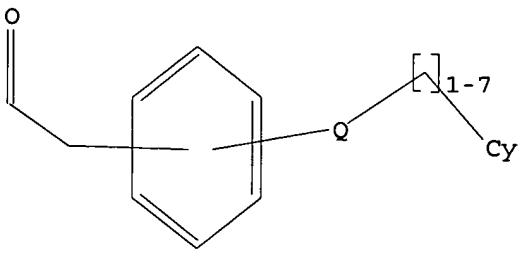
L1 STR

09/ 943,037 -- CLAIM 13



G1 O,S,N

Structure attributes must be viewed using STN Express query preparation.

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  0.2% PROCESSED    1000 ITERATIONS                          0 ANSWERS
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SEARCH TIME: 00.00.01

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                        BATCH   **INCOMPLETE**
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PROJECTED ANSWERS:         EXCEEDS       0

L2            0 SEA SSS SAM L1

=> s l1 ful
FULL SEARCH INITIATED 12:21:52 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - >1,000,000 TO ITERATE

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<   2.9% PROCESSED  336228 ITERATIONS                       390 ANSWERS

<   3.5% PROCESSED  400000 ITERATIONS                       436 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.01.27

FULL FILE PROJECTIONS:  ONLINE  **INCOMPLETE**
                        BATCH   **INCOMPLETE**
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PROJECTED ANSWERS:         EXCEEDS   12224

L3          436 SEA SSS FUL L1

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COST IN U.S. DOLLARS                        SINCE FILE      TOTAL
                                               ENTRY    SESSION
FULL ESTIMATED COST                           149.75     149.96

FILE 'CAPLUS' ENTERED AT 12:24:32 ON 04 MAY 2003
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
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09/ 943,037 -- CLAIM 13

FILE COVERS 1907 - 4 May 2003 VOL 138 ISS 19
FILE LAST UPDATED: 2 May 2003 (20030502/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

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      2997471 PREP/RL
L4          40 L3/PREP
                (L3 (L) PREP/RL)

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YOU HAVE REQUESTED DATA FROM 40 ANSWERS - CONTINUE? Y/(N):y

L4   ANSWER 1 OF 40  CAPLUS  COPYRIGHT 2003 ACS
ACCESSION NUMBER:        2003:282563  CAPLUS
TITLE:                   Preparation of spiro-hydantoin compounds useful as
                         anti-inflammatory agents
INVENTOR(S):             Dhar, T. G. Murali; Potin, Dominique; Maillet, Magaili
                         Jeannine Blandine; Launay, Michele; Nicolai, Eric
                         Antoine; Iwanowicz, Edwin J.
PATENT ASSIGNEE(S):      Bristol-Myers Squibb Company, USA; Cerep Sa
SOURCE:                  PCT Int. Appl., 202 pp.
                         CODEN: PIXXD2
DOCUMENT TYPE:           Patent
LANGUAGE:                English
FAMILY ACC. NUM. COUNT:  1
PATENT INFORMATION:

     PATENT NO.        KIND  DATE           APPLICATION NO.  DATE
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     WO 2003029245      A1   20030410       WO 2002-US31283  20020930
         W:  AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
             UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD,
             RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG,
             CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL,
             PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,
             NE, SN, TD, TG
PRIORITY APPLN. INFO.:                  US 2001-326361P  P  20011001
                                        US 2002-354113P  P  20020204
                                        US 2002-400259P  P  20020801
GI
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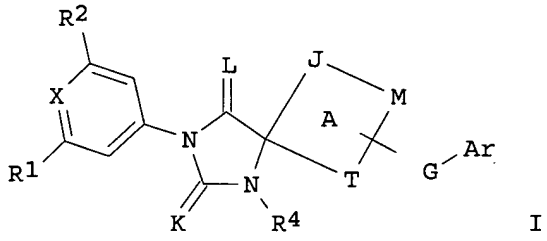
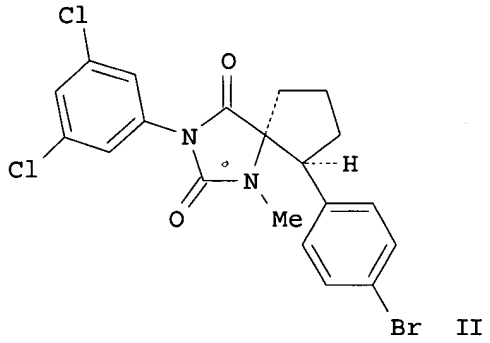


I



II

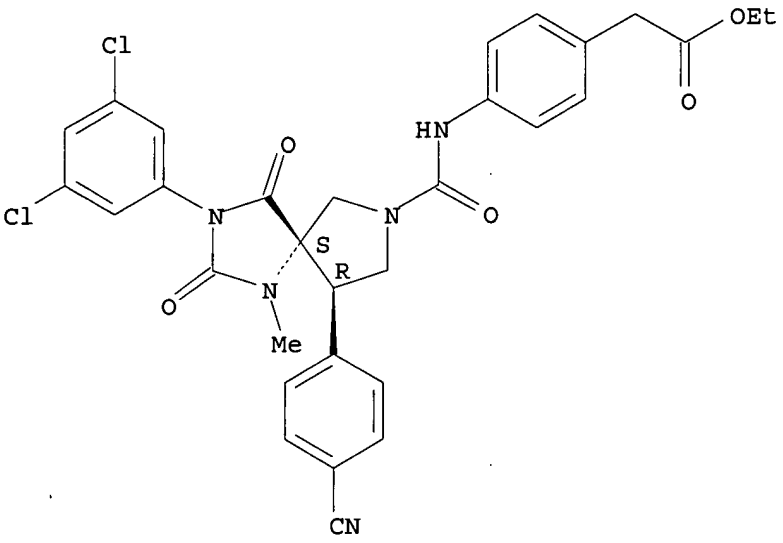
AB Title compds. I [L and K independently = O or S; X = N or CR3; Ar = aryl or heteroaryl; G is attached via T or M with provision when attached to C, G = bond, O, N, S, (un)substituted alkylene, bivalent alkoxy, etc., when G is attached to N, G = bond, (un)substituted alkylene, bivalent acyl or alkoxycarbonyl, and a bivalent alkoxy, alkylthio, aminoalkyl, sulfonyl, or sulfonamidyl wherein each of said G groups have at least one carbon atom attached to ring A; T = T1 when G-Ar is attached to T, and T2 when G-Ar is attached to M; M = M1 when G-Ar is attached to M, and M2 when G-Ar is attached to T; T1 and M1 = N, CR5; T2 and M2 = O, S, -N=, SO2, etc.; R1, R2, and R3 independently = H, halo, (un)substituted-alkyl, -alkenyl, NO2, etc.; R4 = H, (un)substituted alkyl, OH, NH2, alkoxy, etc.; R5 = H, (un)substituted alkyl, halo, CN, OH, etc.; J = O, S, -N=, SO2, substituted N, etc.;], and pharmaceutically-acceptable salts, hydrates,enantiomers, and diastereomers, and prodrugs thereof, (I) are prepd. and disclosed as inhibitors of LFA-1/ICAM and as anti-inflammatory agents. Thus, II was prepd. by base catalyzed cyclization of 1-bromo-4-(1,4-dibromobutyl)benzene (prepn. given) with 3-(3,5-dichlorophenyl)-1-methylimidazolidine-2,4-dione. Assays indicated I have a measurable level of activity as inhibitors of LFA-1 and/or ICAM (no data).

IT **509082-09-1P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(drug candidate; prepn. of spirohydantoins as antiinflammatory agents)

RN 509082-09-1 CAPLUS

CN INDEX NAME NOT YET ASSIGNED

Relative stereochemistry.



REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 2 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:261820 CAPLUS
DOCUMENT NUMBER: 138:287978
TITLE: Novel ligands for the HisB10 Zn2+ sites of the R-state insulin hexamer
INVENTOR(S): Olsen, Helle Birk; Kaarsholm, Niels C.; Madsen, Peter; Ostergaard, Soren; Ludvigsen, Svend; Jakobsen, Palle; Petersen, Anders Klarskov; Steensgaard, Dorte Bjerre
PATENT ASSIGNEE(S): Novo Nordisk A/S, Den.
SOURCE: PCT Int. Appl., 342 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003027081	A2	20030403	WO 2002-DK595	20020913

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.:

DK 2001-1337	A	20010914
US 2001-323925P	P	20010921
DK 2002-1066	A	20020705
US 2002-396051P	P	20020710

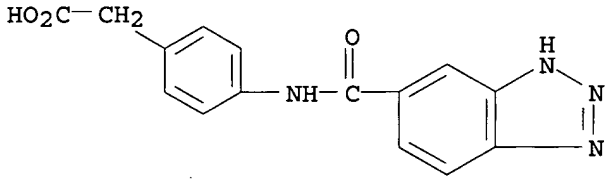
AB Novel ligands for the HisB10 Zn2+ sites of the R-state insulin hexamer that are capable of prolonging the action of insulin prepns. are disclosed. The ligands stabilize the hexamers and modify soly. in the neutral range, thus releasing insulin slowly following s.c. injection.

09/ 943,037 -- CLAIM 13

Zinc-binding ligands A-B-C-D-X [A is a group which reversibly binds to a HisB10 Zn2+ site of an insulin hexamer; B is a linker selected from a valence bond or a chem. group GB of formula -B1-B2-CO-, -B1-B2-SO2-, -B1-B2-CH2-, or -B1-B2-NH-, where B1 is a valence bond, O, S, NH, or alkylimino and B2 is a valence bond, alk(en)(yn)ylene, (hetero)arylene, alkanedioyl, etc.; C is a fragment consisting of 0-5 neutral amino acids; D is a fragment comprising 1 to 20 pos. charged groups selected from amino or guanidino groups; X is OH, NH2 or a diamino group], including pharmaceutically-acceptable salts, isomers or racemates, are claimed. Thus, benzotriazol-5-ylcarbonyl-Gly2-Arg5-NH2 (BT-G2R5) was prepd. and its effect on the pH-soly. profile of an insulin prepn. is shown graphically.

IT **503826-41-3P**
RL: BCP (Biochemical process); SPN (Synthetic preparation); BIOL (Biological study); **PREP (Preparation)**; PROC (Process)
(novel ligands for histidine-B10 zinc(II) sites of R-state insulin hexamer)

RN 503826-41-3 CAPLUS
CN INDEX NAME NOT YET ASSIGNED



L4 ANSWER 3 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:261813 CAPLUS
DOCUMENT NUMBER: 138:287667
TITLE: Preparation of 1-[2-(aryloxy)ethyl]-1H-pyrazoles useful in the treatment of hyper-proliferative disorders
INVENTOR(S): Khire, Uday; Zhang, Chengzhi; Kluender, Harold C. E.; Mugge, Ingo; Hong, Zhenqiu; Shao, Jianxing; Bifulco, Neil; Trail, Pamela A.; Dumas, Jacques; Lavoie, Rico C.; Liu, Xiao-Gao; Agarwal, Veena; Verma, Sharad K.; Wang, Lei
PATENT ASSIGNEE(S): Bayer Corporation, USA
SOURCE: PCT Int. Appl., 121 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003027074	A1	20030403	WO 2002-US29958	20020920

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-324573P P 20010925

09/ 943,037 -- CLAIM 13

GI

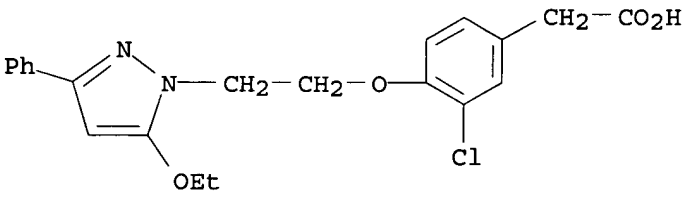
* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB Title compds. I and II [wherein R1 = H, halo, or CN; R2 = H, CN, COR6, halo, or alkyl; R3 = CF3 or (un)substituted alkyl, Ph, furyl, thienyl, isoxazolyl, pyridyl, or benzodioxolyl; R4 = H, alkyl, halo, or CN; X = O or NH; R5 = (un)substituted alkyl; R6 = H or alkyl; R7 = alkoxy, Br, Cl, F, CF3, CN, CO2H, NHCOR14, or (un)substituted alkyl, Ph, thienyl, pyridyl, pyrimidyl, pyrrolyl, furyl, oxazolyl, benzothienyl, benzofuryl, morpholinyl, pyrrolidinyl, piperidinyl, naphthyl, or benzodioxolyl; Y = H, alkyl, alkoxy, CN, or halo; R8 = (un)substituted Ph; R9 = H, alkyl, Br, Cl, or F; R10 = (un)substituted alkyl; R14 = alkyl; n = 0-2; or pharmaceutically acceptable salts thereof] were prepd. as angiogenesis inhibitors. For example, etherification of 1,6-dibromo-2-naphthol with dibromoethane gave the bromoethoxy deriv. (93%). Addn. of NH2NH2.bul.H2O in 2N HCl and CH2Cl2 provided 1-[2-[(1,6-dibromo-2-naphthyl)oxy]ethyl]hydrazine.bul.HCl (78%). Cyclization of the hydrazine with Et benzoylacetate afforded the pyrazolone (39%), which was treated with 1,1'-(azodicarbonyl)dipiperidine, PBu3, and EtOH to give III (78%). In an in vivo tumor model assay using human colon tumor HCT-116 cells implanted in mice, I and II significantly inhibited tumor growth compared to controls. All treatments were well tolerated with no lethality or wt. loss in any group. Thus, I and II are useful for the treatment of hyper-proliferative disorders and angiogenesis dependent disorders, esp. colon, breast, and lung cancer.

IT **503813-92-1P**, [3-Chloro-4-[2-(5-ethoxy-3-phenyl-1H-pyrazol-1-yl)ethoxy]phenyl]acetic acid
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(anticancer agent; prepn. of [(aryloxy)ethyl]pyrazoles for treatment of hyper-proliferative disorders)

RN 503813-92-1 CAPLUS

CN INDEX NAME NOT YET ASSIGNED



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 4 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:261668 CAPLUS

DOCUMENT NUMBER: 138:287524

TITLE: Preparation of 3-(heteroarylamino)methylene-1,3-dihydro-2H-indol-2-ones as tyrosine kinase inhibitors for regulating, modulating and/or inhibiting abnormal cell proliferation

INVENTOR(S): Andrews, Steven W.; Wurster, Julie A.

PATENT ASSIGNEE(S): Allergan, Inc., USA

SOURCE: PCT Int. Appl., 70 pp.
CODEN: PIXXD2

09/ 943,037 -- CLAIM 13

DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

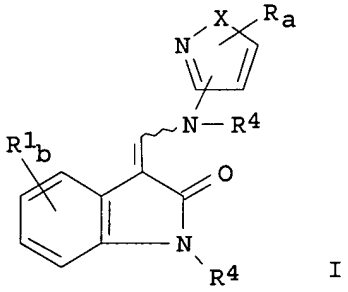
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003026650	A1	20030403	WO 2002-US30922	20020927

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-325816P P 20010927
US 2001-325817P P 20010927

GI

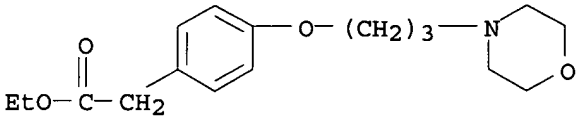


I

AB The present invention relates to 3-(heteroarylamino)methylene-1,3-dihydro-2H-indol-2-ones (shown as I; variables defined below; e.g. 3-[(5-furan-2-yl-1H-pyrazol-3-ylamino)methylene]-1,3-dihydroindol-2-one), capable of modulating tyrosine kinase signal transduction to regulate, modulate and/or inhibit abnormal cell proliferation. Inhibitory biol. data are presented for .ltorsim.50 examples of I for the following assays: VEGF stimulated calcium ion signal in vitro, KDR, and VEGF-induced dermal extravasation in guinea pig (Miles Assay). Although the methods of prepn. are not claimed, 53 example prepns. are included. For I: R1 = halogen and C1-C4 alkyl; X = NR3 and O; R = C1-C6 alkyl, R2d-Ph substituted Ph(CH2)c, R2d-substituted Y-contg. 5-membered ring, halogen, CN, SR3, CO2R3, CMe:CHCMe:N and FC:CHCH:CH; Y = O and S; R2 = R3, OR3, C(O)OR3 and N(R3)2; a = 0-2; b = 0-3; c = 0-2; d = 1-3; R3 = H, C1-C8 alkyl, benzyl, dialkylaminoalkyl, N-Me piperazinylalkyl and morpholinylalkyl; R4 = H, C1-C8 alkyl and phenyl; the wavy line = a E or Z bond.

IT **503819-19-0P**, [4-(3-Morpholinopropoxy)phenyl]acetic acid ethyl ester
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(prepn. of (heteroarylamino)methylene indolones as tyrosine kinase inhibitors for regulating, modulating and/or inhibiting abnormal cell proliferation)

RN 503819-19-0 CAPLUS
CN INDEX NAME NOT YET ASSIGNED



REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

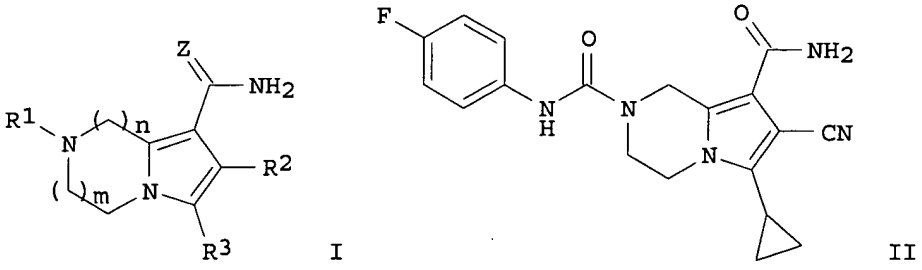
L4 ANSWER 5 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:242334 CAPLUS
DOCUMENT NUMBER: 138:255255
TITLE: Preparation of 1,2,3,4-tetrahydropyrrolo[1,2-a]pyrazine-8-carboxamides as protein kinase inhibitors for treatment of cancer
INVENTOR(S): Ratcliffe, Andrew James; Walsh, Rodger John Aitchison; Majid, Tahir Nadeem; Thurairatnam, Sukanthini; Amendola, Shelly; Aldous, David John; Souness, John Edward; Nemecek, Conception; Wentzler, Sylvie; Venot, Corinne
PATENT ASSIGNEE(S): Aventis Pharma S.A., Fr.
SOURCE: PCT Int. Appl., 269 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003024967	A2	20030327	WO 2002-EP11131	20020917

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: GB 2001-22560 A 20010919
US 2002-355860P P 20020211
OTHER SOURCE(S): MARPAT 138:255255
GI



I II

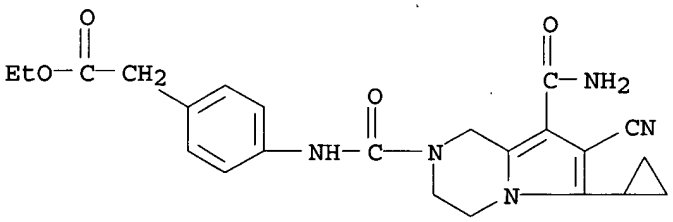
AB Title compds. I [wherein R1 = H, R4, CYNHR4, SO2NHR4, CZ1R4, SO2R4, or CZ1OR4; R2 = H, CN, halo, or C.tplbond.CR5; R3 = H, acyl, alkoxycarbonyl,

alkyl, (hetero)aroyl, (hetero)aryl, aryloxycarbonyl, carboxy, cycloalkenyl, (hetero)cycloalkyl, or CONY1Y2; R4 = (un)substituted alkyl, (hetero)cycloalkyl, or cycloalkenyl; R5 = H or alkyl; Y = O, S, or NCN; Y1 and Y2 = independently H, alkyl, (hetero)aryl, (hetero)cycloalkyl, or cycloalkenyl; or NY1Y2 = heterocyclyl; Z and Z1 = independently O or S; n = 0-2; m = 1-2; and their corresponding N-oxides, prodrugs, pharmaceutically acceptable salts, and solvates thereof] were prepd. as protein kinase inhibitors, esp. type 1 insulin-like growth factor receptor (IGF1R) and focal adhesion kinase (FAK). For example, 7-cyano-6-cyclopropyl-1,2,3,4-tetrahydropyrrolo[1,2-a]pyrazine-8-carboxylic acid amide trifluoroacetate was coupled with 4-fluoroisocyanate in the presence of TEA in CH2Cl2 to give II. The latter produced dose-dependent protection against LY294002-induced toxicity in cerebellar granule cells with IC50 of 7 .mu.M. I or compns. contg. I and other anticancer chemotherapeutics are useful for the treatment of cancer (no data).

IT **502932-03-8P**, [4-[[(8-Carbamoyl-7-cyano-6-cyclopropyl-3,4-dihydro-1H-pyrrolo[1,2-a]pyrazin-2-yl)carbonyl]amino]phenyl]acetic acid ethyl ester
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(protein kinase inhibitor; prepn. of pyrrolopyrazinecarboxamides as protein kinase inhibitors for treatment of cancer)

RN 502932-03-8 CAPLUS

CN Benzeneacetic acid, 4-[[[8-(aminocarbonyl)-7-cyano-6-cyclopropyl-3,4-dihydropyrrolo[1,2-a]pyrazin-2(1H)-yl]carbonyl]amino]-, ethyl ester (9CI) (CA INDEX NAME)



L4 ANSWER 6 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:242299 CAPLUS
DOCUMENT NUMBER: 138:271539
TITLE: Preparation of substituted piperidines with selective binding to histamine h3-receptor for treatment and/or prevention of histamine receptor related diseases
INVENTOR(S): Doerwald, Florencio Zaragoza
PATENT ASSIGNEE(S): Novo Nordisk A/S, Den.; Boehringer Ingelheim International G.m.b.H.
SOURCE: PCT Int. Appl., 64 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003024929	A1	20030327	WO 2002-DK594	20020911

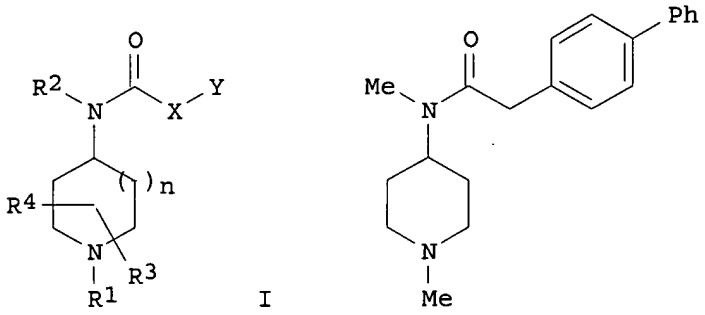
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,

LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: DK 2001-1344 A 20010914
OTHER SOURCE(S): MARPAT 138:271539

GI



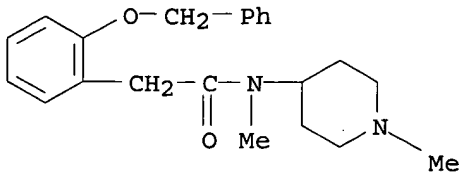
I II

AB Prepn. of title compds. I [n = 0-2; R1 = (un)substituted alkyl, -alkenyl, -alkynyl, -cycloalkyl, etc.; R2 = alkyl, alkenyl, alkynyl, cycloalkyl, cycloalkylalkyl; R3 and R4 independently equal H, Me, CF3; X = CH2(CH2)m, (CH2)mCH:CH(CH2)p, CH2(CH2)mO(CH2)p, CH2(CH2)mCO(CH2)p, etc., wherein m and p independently = 0-4; Y = (un)substituted aryl, -heteroaryl, -cycloalkyl, -cycloalkenyl, -alkyl, -alkenyl or -alkynyl], pharmaceutical compns. comprising them and use thereof in the treatment and/or prevention of diseases and disorders related to the histamine H3 receptor is disclosed. Thus, II was prepd. via esterification of resin bound o-nitrophenol with 4-biphenylacetic acid and subsequent amidation/cleavage with 1-methyl-4-methylaminopiperidine. Three sep. binding assays are described (no data). More particularly, the compds. are useful for the treatment and/or prevention of diseases and disorders in which an interaction with the histamine H3 receptor is beneficial.

IT **503125-14-2P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of amidopiperidines as selective histamine h3-receptor ligands via amidation of carboxylic acids with aminopiperidines employing solid phase synthetic techniques)

RN 503125-14-2 CAPLUS

CN Benzeneacetamide, N-methyl-N-(1-methyl-4-piperidinyl)-2-(phenylmethoxy)- (9CI) (CA INDEX NAME)



09/ 943,037 -- CLAIM 13

REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

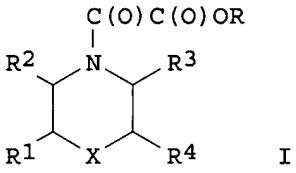
L4 ANSWER 7 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:223755 CAPLUS
DOCUMENT NUMBER: 138:255254
TITLE: Preparation of oxamate derivatives with nitrogen part of six-membered heterocycle useful for treating hyperglycemia-related disorders
INVENTOR(S): Moinet, Gerard; Leriche, Gerard
PATENT ASSIGNEE(S): Lipha, Fr.
SOURCE: Fr. Demande, 43 pp.
CODEN: FRXXBL
DOCUMENT TYPE: Patent
LANGUAGE: French
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
FR 2829766	A1	20030321	FR 2001-11950	20010914
WO 2003024946	A2	20030327	WO 2002-EP9435	20020823

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: FR 2001-11950 A 20010914
GI



I

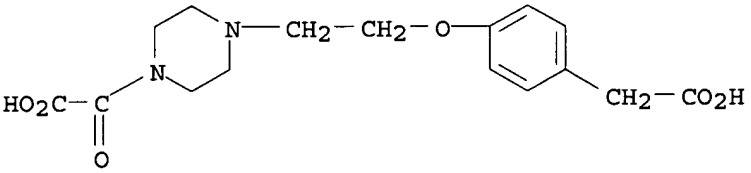
AB The invention relates to heterocyclic oxamates (shown as I; variables defined below; e.g. sodium (4-acetylpiperazino)oxoacetate), tautomeric, enantiomeric, diastereomeric and epimeric forms and pharmaceutically acceptable salts, methods for prepg. them and use in treatment of pathologies assocd. with the hyperglycemia. For I: R = H, alkyl (C1-C3); X = O, S, -CR5R5'- or -NR6-; R1, R2, R3 and R4 = H or alkyl (C1-C3); addnl. details are given in the claims. The ability of 18 examples of I to reduce glycemia in diabetic rats is tabulated for 20 mg/kg/day after 1 and 4 days of treatment and also for 200 mg/kg/J after 1 and 4 days of treatment; for example, 18, 24, 16 and 18 %, resp., redns. were found for sodium (4-acetylpiperazino)oxoacetate. One example prepn. of I is included, but characterization data is included for 155 examples of I. For example, [4-(3-methoxyphenyl)piperazin-1-yl]oxoacetic acid was prepd. in 41% yield from reaction of 1-(3-methoxyphenyl)piperazine in THF with ethoxalyl chloride in toluene in the presence of K2CO3 followed by base hydrolysis of the formed ester. 2-Oxo-[4-(toluene-4-sulfonyl)piperazin-1-yl]acetic acid Et ester was prepd. in 54% yield by reacting piperazine

with ethoxalyl chloride in acetic acid to give 2-oxo-2-piperazin-1-ylacetic acid Et ester hydrochloride followed by tosylation.

IT **502456-61-3P**, (4-(2-(4-(Carboxymethyl)phenoxy)ethyl)piperazin-1-yl)oxoacetic acid
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(drug candidate; prepn. of oxamate derivs. with nitrogen part of six-membered heterocycle useful for treating hyperglycemia-related disorders)

RN 502456-61-3 CAPLUS

CN 1-Piperazineacetic acid, 4-[2-[4-(carboxymethyl)phenoxy]ethyl]-.alpha.-oxo- (9CI) (CA INDEX NAME)



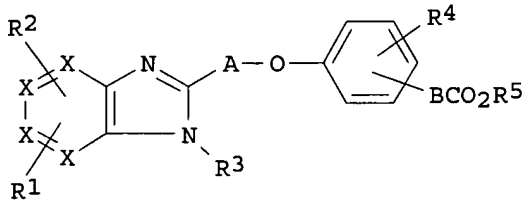
REFERENCE COUNT: 15 THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 8 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:223754 CAPLUS
DOCUMENT NUMBER: 138:238186
TITLE: Preparation of imidazolylalkoxybenzoic and imidazolylalkoxyarylalkanoic derivatives for treatment of hyperglycemia-related disorders
INVENTOR(S): Moinet, Gerard; Correc, Jean Claude; Metais, Eric
PATENT ASSIGNEE(S): Lipha, Fr.
SOURCE: Fr. Demande, 102 pp.
CODEN: FRXXBL
DOCUMENT TYPE: Patent
LANGUAGE: French
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
FR 2829765	A1	20030321	FR 2001-11952	20010914
WO 2003024937	A1	20030327	WO 2002-EP9832	20020903

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: FR 2001-11952 A 20010914
OTHER SOURCE(S): MARPAT 138:238186
GI



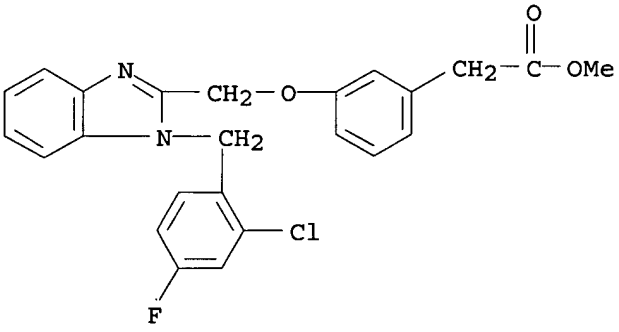
I

AB The invention relates to imidazolylalkoxybenzoic and imidazolylalkoxyarylalkanoic derivs. (shown as I; variables defined below; e.g. 4-(1-benzyl-5,6-dimethylbenzimidazol-2-ylmethoxy)phenylacetic acid), methods for prepg. them and their use in treatment of pathologies assocd. with hyperglycemia. For I: X = C, N, O or S; R1, R2, R3, R4 and R5 = H, alkyl ((un)substituted C1-C20); alkylene ((un)substituted C2-C20), cycloalkyl ((un)substituted C3-C8), heterocycloalkyl ((un)substituted C3-C8), (un)substituted aryl (C6-C14) alkyl (C1-C20), (un)substituted aryl (C6-C14), (un)substituted heteroaryl (C1-C13); A = (un)substituted alkyl (C1-C6); B = simple bond or (un)substituted alkyl (C1-C6); with various provisos listed in the claims. The percentage redns. of glycemia in rats by 7 examples of I at 200 mg/kg after 4 days are 13-22 and for 4 examples of I at 20 mg/kg are 13-14; for example, 14% at 20 mg/kg for 4-(1-benzyl-5,6-dimethylbenzimidazol-2-ylmethoxy)phenylacetic acid. Two example prepns. of I are included and mass spectral characterization data are provided for .apprx.400 examples of I. For example, 3-[1-(2-chloro-4-fluorophenylmethyl)-2-benzimidazolyl]methoxyphenylacetic acid was prepd. in 3 steps via the following intermediates: the sodium salt of Me 3-(2-benzimidazolyl)methoxyphenylacetate (67% from Me 3-cyanomethoxybenzoate and 1,2-diaminobenzene dihydrochloride) and Me 3-[1-(2-chloro-4-fluorophenylmethyl)-2-benzimidazolyl]methoxyphenylacetate .

IT **502179-01-3P**, Methyl 3-[[1-(2-chloro-4-fluorophenylmethyl)-2-benzimidazolyl]methoxy]phenylacetate
RL: PAC (Pharmacological activity); RCT (Reactant); **PREP (Preparation)**; THU (Therapeutic use); **PREP (Preparation)**; **PREP (Preparation)**; RACT (Reactant or reagent); USES (Uses)
(drug candidate; prepn. of imidazolylalkoxyarylalkanoic derivs. for treatment of hyperglycemia-related disorders)

RN 502179-01-3 CAPLUS

CN Benzeneacetic acid, 3-[[1-[(2-chloro-4-fluorophenyl)methyl]-1H-benzimidazol-2-yl]methoxy]-, methyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 9 OF 40 CAPLUS COPYRIGHT 2003 ACS

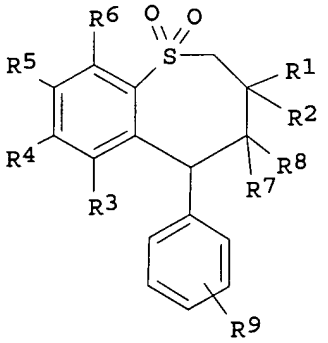
09/ 943,037 -- CLAIM 13

ACCESSION NUMBER: 2003:221671 CAPLUS
DOCUMENT NUMBER: 138:238032
TITLE: Preparation of benzothiepine derivatives for potential use as ileal bile acid transport inhibitors for the treatment of hyperlipidemia
INVENTOR(S): Starke, Ingemar; Dahlstrom, Mikael Ulf Johan; Blomberg, David
PATENT ASSIGNEE(S): Astrazeneca AB, Swed.; Astrazeneca UK Limited
SOURCE: PCT Int. Appl., 66 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003022830	A1	20030320	WO 2002-GB4029	20020905

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: GB 2001-21622 A 20010907
OTHER SOURCE(S): MARPAT 138:238032
GI



I

AB Benzothiepines I, wherein R1 and R2 are selected from hydrogen, alkyl, alkenyl, and the other is selected from alkyl, alkenyl; R3 and R6 and the other of R4 and R5 are independently selected from hydrogen, halo, nitro, cyano, hydroxy, amino, carboxy, carbamoyl, mercapto, sulphamoyl, alkyl, alkenyl, alkynyl, alkoxy, alkanoyl, alkanoyloxy, N-(alkyl)amino, N,N-(alkyl)2amino, alkanoylamino, N-(alkyl)carbamoyl, N,N-(alkyl)2carbamoyl, alkyl-S(O)a wherein a is 0 to 2, alkoxycarbonyl, N-(alkyl)sulphamoyl and N,N-(alkyl)2sulphamoyl; wherein R3 and R6 and the other of R4 and R5 may be optionally substituted on carbon; R7 and R8 are independently H, OH, amino, mercapto, alkyl, alkoxy, alkyl-S(O)a wherein a is 0 to 2; R9 is (Rz)v; Rz is selected from halo, nitro, cyano, hydroxy, amino, carboxy, carbamoyl, mercapto, sulphamoyl, alkyl, alkenyl, alkynyl,

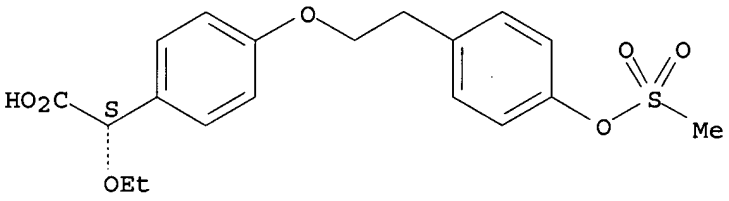
alkoxy, alkanoyl, alkanoyloxy, N-(alkyl)amino, N,N-(alkyl)2amino, alkanoylamino, N-(alkyl)carbamoyl, N,N-(alkyl)2carbamoyl, alkyl-S(O)a wherein a is 0 to 2, alkoxycarbonyl, N-(alkyl)sulphamoyl and N,N-(alkyl)2sulphamoyl; v is 0-5; variable groups are as defined within; pharmaceutically acceptable salts, solvates, solvates of such salts and prodrugs thereof and their potential use as ileal bile acid transport (IBAT) inhibitors for the treatment of hyperlipidemia. Processes for their manuf. and pharmaceutical compns. contg. them are also described. Thus, 1,1-Dioxo-3-butyl-3-ethyl-4-hydroxy-5-phenyl-7-(N-{(R)-.alpha.-[N-(carboxymethyl)carbamoyl]benzyl}carbamoylmethylthio)-2,3,4,5-tetrahydro-1,4-benzothiepine was prepd. and tested as ileal bile acid transport inhibitor and for the treatment of hyperlipidemia (no data).

IT **501923-62-2P**
RL: IMF (Industrial manufacture); SPN (Synthetic preparation); **PREP (Preparation)**
(prepn. of benzothiepine derivs. for potential use as ileal bile acid transport inhibitors for the treatment of hyperlipidemia)

RN 501923-62-2 CAPLUS

CN Benzeneacetic acid, .alpha.-ethoxy-4-[2-[4-[(methylsulfonyl)oxy]phenyl]ethoxy]-, (.alpha.S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



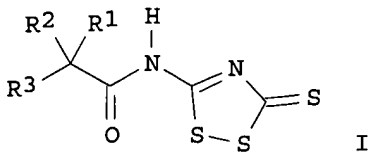
REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 10 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:165072 CAPLUS
DOCUMENT NUMBER: 138:205063
TITLE: Preparation of dithiazoles, and matrix metalloprotease (MMP) inhibitors, external medicines, and cosmetic and pharmaceutical compositions containing them
INVENTOR(S): Hiruma, Takuya; Kobayashi, Koji; Inomata, Shinji
PATENT ASSIGNEE(S): Shiseido Co., Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 38 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2003064065	A2	20030305	JP 2001-258066	20010828
WO 2003020711	A1	20030313	WO 2002-JP8649	20020828

W: CN, KR, US
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR

PRIORITY APPLN. INFO.: JP 2001-258066 A 20010828
OTHER SOURCE(S): MARPAT 138:205063
GI



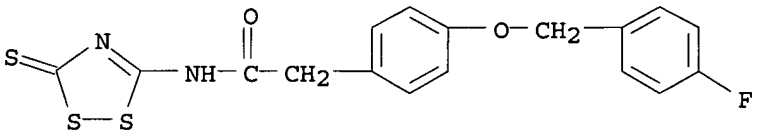
I

AB Dithiazoles I [R1 = H, alkyl, alkenyl, aryl, heteroarylalkyl, OH, alkoxyalkyl, etc.; R2 = H, alkyl, aryl, arylalkyl, heteroaryl, OH, alkoxy, hydroxyalkyl, amino, etc.; R3 = AYNR4, (un)substituted Ph(CH2)n, R8NHCOCHR9NHCOCHR10; A = alkyl, alkoxy, aryl,heteroaryl, etc.; Y = SO2, CO; R4 = H, alkyl, aryl, arylalkyl, heteroaryl, heteroarylalkyl, hydroxyalkyl, alkoxyalkyl, etc.; n = 0, 1; R8 = H, alkyl; R9 = .alpha.-amino acid residue; R10 = H, alkyl, alkenyl, arylalkyl] or their salts are prepd. The compds. are useful for antiaging cosmetics, and for prevention and treatment of abnormal metab. of tissue matrix, e.g. arthritis, bone disease, periodontosis, multiple sclerosis, tumor metastasis, etc. (no data). Thus, condensation of 4-MeOC6H4SO2NHCH2Ph with BrCH2CO2Et gave 96% Et 2-[benzyl[(4-methoxyphenyl)sulfonyl]amino]acetate, which was hydrolyzed and amidated with 3-amino-1,2,4-dithiazole-5-thione to afford I (R1 = R2 = H, R3 = 4-MeOC6H4SO2NCH2Ph). The product almost completely inhibited murine MMP-9.

IT **500573-60-4P**
RL: COS (Cosmetic use); PAC (Pharmacological activity); **PREP (Preparation)**; THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of dithiazoles as matrix metalloprotease inhibitors for cosmetics and pharmaceuticals)

RN 500573-60-4 CAPLUS

CN Benzeneacetamide, 4-[(4-fluorophenyl)methoxy]-N-(3-thioxo-3H-1,2,4-dithiazol-5-yl)- (9CI) (CA INDEX NAME)



L4 ANSWER 11 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:154382 CAPLUS

DOCUMENT NUMBER: 138:187795

TITLE: Preparation of aryl or heterocyclyl-substituted benzoic acid and alkanoic acid derivatives as antagonists of prostaglandin E2 (PEG2) receptors

INVENTOR(S): Tani, Kousuke; Asada, Masaki; Kobayashi, Kaoru; Narita, Masami; Ogawa, Mikio

PATENT ASSIGNEE(S): Ono Pharmaceutical Co., Ltd., Japan

SOURCE: PCT Int. Appl., 1009 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

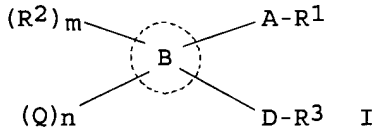
LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003016254	A1	20030227	WO 2002-JP8120	20020808

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
PRIORITY APPLN. INFO.: JP 2001-241867 A 20010809
OTHER SOURCE(S): MARPAT 138:187795
GI



I

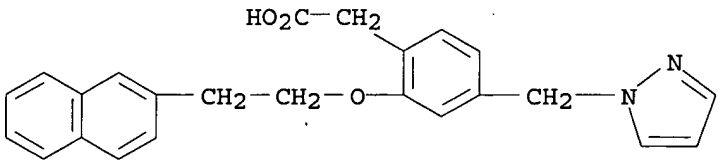
AB Carboxylic acid derivs. (I) and nontoxic salts thereof [wherein R1 = CO2H, CO2R4, CH2OH, COR5SO2R6, CONH2, CH2NR5SO2R6, CH2NR9COR10, CH2NR9CONR5SO2R6, CH2SO2NR9COR10, CH2O2CNR5SO2R6, tetrazole, 1,2,4-oxadiazol-5-one, 1,2,4-oxadiazol-5-thione, 1,2,4-thiadiazol-5-one, etc. (wherein R4 = C1-6 alkyl, hydroxy-C1-4 alkyl, C1-4 alkoxy-C1-4 alkyl, carboxy-C1-4 alkyl, etc.; R5, R9 = H, C1-6 alkyl; R6 = C1-6 alkyl, C3-15 mono-, di-, or tricarbocyclic, 3- to 13-membered mono-, di-, or tricyclic heterocyclyl, etc.; R10 = H, R6); A = a single bond, C1-6 alkylene, C2-6 alkenylene, C2-6 alkynylene, etc.; the ring B = C3-12 mono- or dicyclic carbocyclic ring, 3- to 12-membered mono- or dicyclic heterocyclic ring; R2 = C1-6 alkyl, C1-6 alkoxy, C1-6 alkylthio, C2-6 alkenyl, C2-6 alkynyl, halo, CHF2, CF3, NO2, cyano, Ph, oxo; m, n = 0,1,2; Q = (C1-4 alkylene, C2-4 alkenylene, or C2-4 alkynylene)-Cyc2, -C1-4 alkylene-Z-Cyc3, amino-C1-4 alkyl, cyano-C1-4 alkyl, acylamino-C1-4 alkyl, 3- to 7-membered monocyclic carbocyclyl, 3- to 6-membered monocyclic heterocyclyl, etc. (wherein Cyc2, Cyc3 = C3-15 mono-, di-, or tricyclic carbocyclyl or heterocyclyl, etc.; Z = O, S, SO, SO2, NH, NHCO, etc.); D = an linking chain consisting of 1-2 or 3-6 of atoms selected from C, N, O, or S, etc.; R3 = C1-6 alkyl, C3-15 mono-, di-, or tricyclic carbocyclyl, 3- to 15-membered mono-, di-, or tricyclic heterocyclyl, etc.] are prepd. These carboxylic acid derivs. include phenylpropanoic acid, phenylpropenoic acid, phenylpropanamide, phenylpropenamide, 3-oxoisoindolin-1-ylacetic acid, benzylbenzoic acid, benzylaminoacetic acid, pyrazolylmethylbenzoic acid, benzoylaminoacetic acid, (pyrazolylmethylphenyl)propenoic acid, pyrazolylmethylpropanoic acid, (pyridinyloxyphenyl)propanoic acid, phenoxyacetic acid, phenylbutanoic acid, (pyrazolylmethyl)propanamide, (piperazinylmethylphenyl)propanamide, (morpholinylmethylphenyl)propanamide , (pyridinyloxyphenyl)propanamide, (pyrazolylmethyl)propenamide (oxoimidazolidinylmethylphenyl)propanamide, (oxopyrrolidinylmethylphenyl)p ropenamide, (thiophenylmethylphenyl)propenamide, (pyrazolylmethylphenylamino)acetamide, (thiazolylaminomethylphenyl)propana mide, thiophenylpropenamide, (pyrazolylmethylphenoxy)acetamide, (phenoxymethyl)benzamide, (pyrazolylmethylphenylethyl)-1,2,4-oxadiazol-5-one, and (pyrazolylmethylphenylindolyl)acetic acid. Because of binding to PEG2 receptors, in particular, subtype EP3 and/or subtype EP4 and having antagonism, the compds. I are useful in preventing and/or treating diseases such as pain, allodynia, hyperalgesia, pruritus (itching), urticaria, atopic dermatitis, contact dermatitis, Urushi (Japanese lacquer tree) dermatitis, allergic conjunctivitis, symptoms during dialysis,

asthma, rhinitis, allergic rhinitis, nasal congestion, sneeze, psoriasis, pollakiuria (increased urinary frequency), urination disorder, ejaculation (semination) disorder, fever (pyrexia), systemic inflammation reaction, learning disorder, Alzheimer's disease, neovascularization, cancer formation, cancer proliferation, cancer metastasis to organs, cancer metastasis to bone, hypercalcemia accompanied by cancer metastasis to bone, retinopathy, rubrum, erythema (rash), leucoma, skin moth-patch, heat burn, burn, steroid burn, kidney failure, nephropathy, acute or chronic nephritis, blood electrolyte disorder, imminent abortion, threatened abortion, excessive menstruation, dysmenorrhea, endometriosis, premenstrual syndrome, uterine gland myopathy, reprodn. disorder, and stress. They are also useful in preventing and/or treating anxiety, depression, psychophysiol. disorder, mental retardation, thrombus, embolism, transient ischemic attack, cerebral infarction, atheroma, organ transplant, heart failure, hypertension, myocardial infarction, arteriosclerosis, circulation disorders or ulcers assocd. therewith, nerve disorders, vascular dementia, edema, diarrhea, constipation, biliary excretion disorder, ulcerative colitis, Crohn's disease, irritable bowel syndrome, redn. of rebound after using steroid drugs, aids for decreasing or removing steroid drugs, bone diseases, systemic granuloma, immune diseases, pyorrhea alveolaris, gingivitis, periodontal disease, nerve cell death, lung disorder, liver disorder, acute hepatitis, myocardial ischemia, Kawasaki disease, multiple organ failure, chronic headache, angiitis, venous failure, varicose vein (varicosis), anal fistula, diabetes insipidus, neonatal patent ductus arteriosus, and cholelithiasis. Thus, 4-hydroxymethyl-2-[2-(naphthalen-2-yl)ethoxy]cinnamic acid Et ester was mesylated by methanesulfonyl chloride in the presence of Et3N in THF at 0.degree. for 15 min and condensed with pyrazole in the presence of NaH in DMF at 0.degree. to give 2-[2-(naphthalen-2-yl)ethoxy]-4-(1-pyrazolylmethyl)cinnamic acid Et ester. 4-[2-[[2-(Naphthalen-1-yl)propanoyl]amino]-4-methylthiomethylphenyl]butanoic acid inhibited the binding of [3H]PGE2 to prostaglandin E2 (PEG2) receptor subtype EP1, Ep2, EP3, and EP4 expressed in CHO cells with Ki of >10, >10, 0.27, and 0.038 .mu.M, resp. A tablet formulation contg. (2E)-2-[2-(naphthalen-2-yl)ethoxy]-4-(1-pyrazolylmethyl)cinnamic acid was described.

IT **499143-85-0P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of aryl or heterocyclyl-substituted benzoic acid and alkanoic acid derivs. as antagonists of prostaglandin E2 (PEG2) receptors as therapeutic agents)

RN 499143-85-0 CAPLUS

CN Benzeneacetic acid, 2-[2-(2-naphthalenyl)ethoxy]-4-(1H-pyrazol-1-ylmethyl)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 12 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:154378 CAPLUS
DOCUMENT NUMBER: 138:205082
TITLE: Preparation of bicyclic hydroxamates as inhibitors of matrix metalloproteinases and/or TNF-.alpha.

converting enzyme (TACE) for treating inflammatory disorders

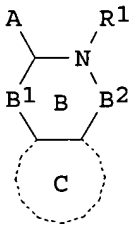
INVENTOR(S): Sheppeck, James; Duan, Jingwu
PATENT ASSIGNEE(S): Bristol-Myers Squibb Company Patent Department, USA

SOURCE: PCT Int. Appl., 102 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

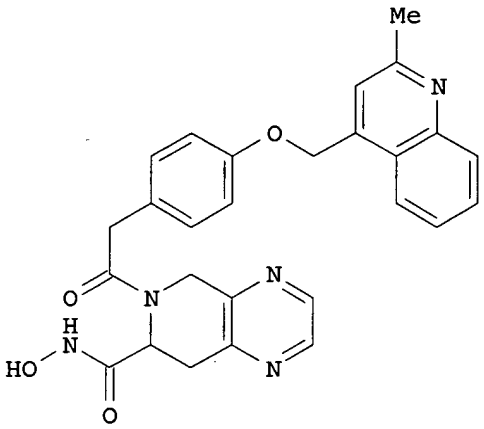
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003016248	A2	20030227	WO 2002-US26018	20020815

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-313052P P 20010817
OTHER SOURCE(S): MARPAT 138:205082
GI



I



II

AB The title compds. [I; A = CONHOH, CONHOR5, CONHOR6, N(OH)COR5, N(OH)CHO, CH2SH; ring B, including B1 and B2, = (un)substituted 5-7 membered heterocyclic ring; B1, B2 consist of 0-3 carbon atoms and 0-1 heteroatoms selected from O, N, and SOp and are substituted with 0-1 carbonyl groups; ring C = (un)substituted 5-10 membered arom. ring consisting of 1-9 carbon atoms and 0-4 heteroatoms selected from O, N, and SOp; R1 = {4-[(2-methyl-4-quinolinyl)methoxy]phenyl}acetyl, {4-[(2-methyl-4-quinolinyl)methoxy]phenyl}sulfonyl, etc.; R5 = (un)substituted alkyl; R6 = Ph, naphthyl, cycloalkyl, etc.], useful as inhibitors of matrix metalloproteinases (MMP), TNF-.alpha. converting enzyme (TACE), aggrecanase, or a combination thereof, were prepd. and formulated. E.g., a 5-step synthesis of II as bis-TFA salt, starting from 2,3-dimethylpyrazine, was given. A no. of compds. I were found to exhibit

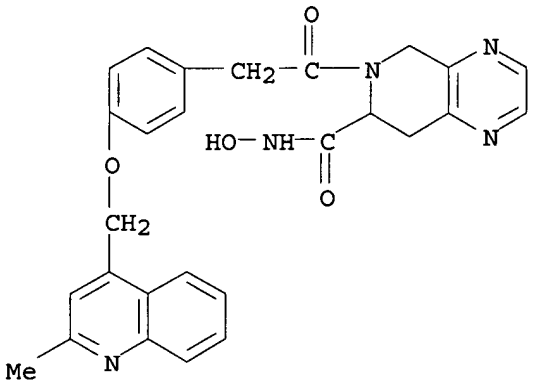
09/ 943,037 -- CLAIM 13

Ki's of .ltoreq.10 .mu.M in MMP assays.

IT **500215-04-3P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); **PREP (Preparation)**; BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of bicyclic hydroxamates as inhibitors of matrix metalloproteinases and/or TNF-.alpha. converting enzyme (TACE))

RN 500215-04-3 CAPLUS

CN Pyrido[3,4-b]pyrazine-7-carboxamide, 5,6,7,8-tetrahydro-N-hydroxy-6-[[4-[(2-methyl-4-quinolinyl)methoxy]phenyl]acetyl]- (9CI) (CA INDEX NAME)



L4 ANSWER 13 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:154243 CAPLUS

DOCUMENT NUMBER: 138:204839

TITLE: Preparation of benzamides affecting glucokinase for combined treatment or prevention of type 2 diabetes and obesity

INVENTOR(S): Boyd, Scott; Caulkett, Peter William Rodney; Hargreaves, Rodney Brian; Bowker, Suzanne Saxon; James, Roger; Johnstone, Craig; Jones, Clifford David; McKerrecher, Darren; Block, Michael Howard

PATENT ASSIGNEE(S): Astrazeneca AB, Swed.; Astrazeneca UK Limited

SOURCE: PCT Int. Appl., 156 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003015774	A1	20030227	WO 2002-GB3745	20020815

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

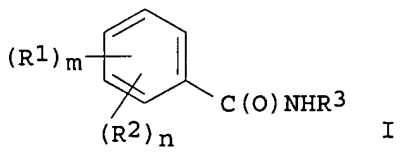
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: SE 2001-2764 A 20010817

OTHER SOURCE(S): MARPAT 138:204839

09/ 943,037 -- CLAIM 13

GI



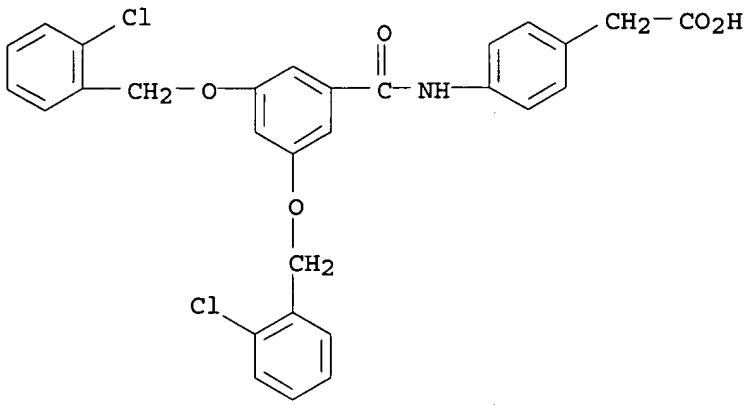
I

AB The invention relates to the use of benzamides (shown as I; variables defined below; e.g. 2-[[3,5-di(2-chlorobenzyloxy)benzoyl]amino]thiazole) or a salt, solvate or prodrug thereof, in the prepn. of a medicament for the treatment or prevention of a disease condition mediated through glucokinase (GLK; no data), such as type 2 diabetes, and to the compds. I and methods for prepg. them. Twelve pharmaceutical compns. are included. For I: m is 0-2; n is 0-4; and n + m > 0; each R1 = OH, -(CH2)1-4OH, -CH3-aFa, -(CH2)1-44CH3-aFa, -OCH3-aFa, halo, C1-6alkyl, C2-6alkenyl, C2-6alkynyl, NH2, -NH-C1-4alkyl, -N-di(C1-4alkyl), CN, formyl, Ph or heterocyclyl optionally substituted by C1-6alkyl. Each R2 is the group Y-X- wherein each X is a linker = -O-Z-, -O-Z-O-Z-, -C(O)O-Z-, -OC(O)-Z-, -S-Z-, -SO-Z-, -SO2-Z-, -N(R6)-Z-, -N(R6)SO2-Z-, -SO2N(R6)-Z-, -(CH2)1-4-, -CH:CH-Z-, -C.tplbond.C-Z-, -N(R6)CO-Z-, -CON(R6)-Z-, -C(O)N(R6)S(O)2-Z-, -S(O)2N(R6)C(O)-Z-, -C(O)-Z-, -Z-, -C(O)-Z-O-Z-, -N(R6)-C(O)-Z-O-Z-, -O-Z-N(R6)-Z-, -O-C(O)-Z-O-Z- or a direct bond; each Z = a direct bond, C2-6alkenylene or -(CH2)p-C(R6a)2-(CH2)q-; each Y = aryl-Z1-, heterocyclyl-Z1-, C3-7cycloalkyl-Z1-, C1-6alkyl, C2-6alkenyl, C2-6alkynyl, -(CH2)1-4CH3-aFa or -CH(OH)CH3-aFa; R3 = Ph or a heterocyclyl; addnl. details are given in the claims. More than 30 example prepns. of I are included and >300 specific examples of I are included with characterization data. For example, to prep. 2-[[3,5-di(2-chlorobenzyloxy)benzoyl]amino]thiazole, diisopropylethylamine (2.0 mmol) then 4-dimethylaminopyridine (0.1 mmol) were added to a soln. of 2-aminothiazole (1.0 mmol) and 3,5-di(2-chlorobenzyloxy)benzoic acid chloride (1.0 mmol) in CH2Cl2 (10 mL) under Ar at ambient temp. After 80 mins the reaction mixt. was filtered, washed with CH2Cl2 and dried under high vacuum to give the title compd. as a colorless solid (41%).

IT **499991-42-3P**, N-(4-(Carboxymethyl)phenyl)-3-((2-chlorophenyl)methoxy)-5-((2-chlorophenyl)methoxy)benzamide
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(drug candidate; prepn. of benzamides affecting glucokinase for combined treatment or prevention of type 2 diabetes and obesity)

RN 499991-42-3 CAPLUS

CN Benzeneacetic acid, 4-[[3,5-bis[(2-chlorophenyl)methoxy]benzoyl]amino]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

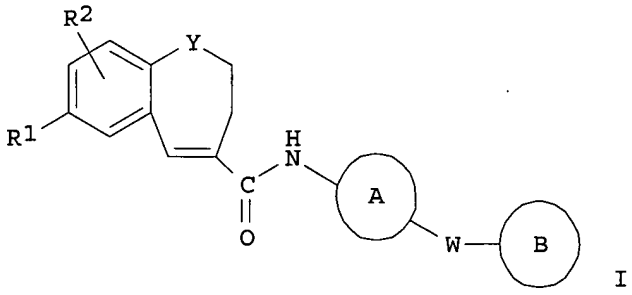
L4 ANSWER 14 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:133263 CAPLUS
DOCUMENT NUMBER: 138:170241
TITLE: Preparation of benzazepine derivatives as CCR5 antagonists
INVENTOR(S): Shiraishi, Mitsuru; Baba, Masanori; Seto, Masaki; Aramaki, Yoshio; Kanzaki, Naoyuki; Miyamoto, Naoki; Iizawa, Yuji
PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan
SOURCE: PCT Int. Appl., 584 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003014110	A1	20030220	WO 2002-JP8045	20020807
JP 2003119191	A2	20030423	JP 2002-229553	20020807

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: JP 2001-240718 A 20010808
OTHER SOURCE(S): MARPAT 138:170241
GI

09/ 943,037 -- CLAIM 13



I

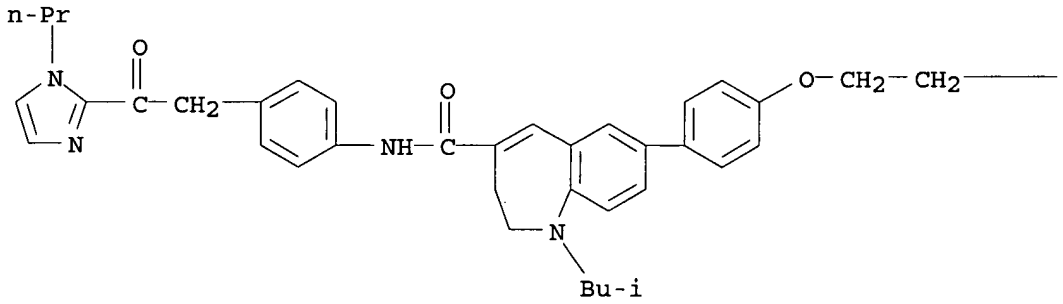
AB The title compds. I [R1 represents a substituted arom. ring; R2 represents lower alkyl, etc.; Y represents optionally substituted imino; rings A and B each represents an optionally substituted arom. ring; and W represents W1X2W2 ; W1 and W2 each represents S(O)m (m is 0, 1, or 2), etc., and X2 represents optionally substituted alkylene, etc.] are prepd. In an in vitro test for CCR5 antagonism, compds. of this invention at 1 .mu.M gave 88% to 100% binding inhibition. A process for prepg. I is disclosed. Formulations are given.

IT **497854-49-6P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of benzazepine derivs. as CCR5 antagonists)

RN 497854-49-6 CAPLUS

CN 1H-1-Benzazepine-4-carboxamide, 7-[4-(2-butoxyethoxy)phenyl]-2,3-dihydro-1-(2-methylpropyl)-N-[4-[2-oxo-2-(1-propyl-1H-imidazol-2-yl)ethyl]phenyl]-(9CI) (CA INDEX NAME)

PAGE 1-A



PAGE 1-B

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REFERENCE COUNT: 27 THERE ARE 27 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 15 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:117825 CAPLUS
DOCUMENT NUMBER: 138:170259
TITLE: Preparation of dipyridodiazepinones as reverse transcriptase inhibitors

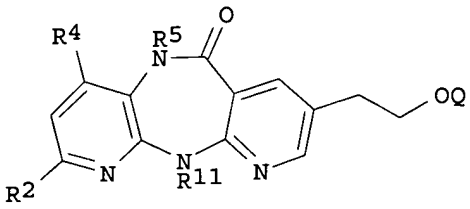
09/ 943,037 -- CLAIM 13

INVENTOR(S): Ogilvie, William W.; Deziel, Robert; O'Meara, Jeffrey; Simoneau, Bruno
PATENT ASSIGNEE(S): Boehringer Ingelheim (Canada) Ltd., Can.
SOURCE: PCT Int. Appl., 71 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003011862	A1	20030213	WO 2002-CA1161	20020726

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-308710P P 20010730
OTHER SOURCE(S): MARPAT 138:170259
GI



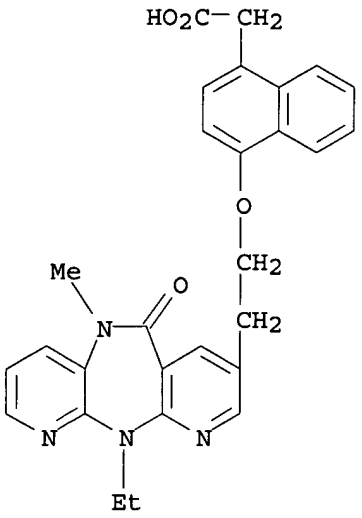
I

AB Title compds. [I; R2 = H, halo, NHNH2, alkyl, alkoxy, haloalkyl; R4 = H, Me; R5 = H, alkyl; R11 = alkyl, alkylcycloalkyl, cycloalkyl; Q = (substituted) naphthyl, fused phenylcycloalkyl, fused phenylheterocyclyl having 1-2 O, N, S], were prepd. Thus, diisopropyl azodicarboxylate in THF was added dropwise to a mixt. of 5,11-dihydro-11-ethyl-2-fluoro-5-methyl-8-(2-hydroxyethyl)-6H-dipyrido[3,2-b:2',3'-e][1,4]diazepin-6-one, Ph3P, and 4-formyl-1-naphthol followed by stirring for 1 h to give 56% formylnaphthyl ether deriv., which was stirred with AgNO3 and NaOH in EtOH/THF to give 62% title compd. I (Q = 4-carboxynaphthyl-1-yl; R2 = F; R4 = H; R5 = Me; R11 = Et) (II). II showed IC50<100 nM against wild type HIV-1 reverse transcriptase.

IT **497067-11-5P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); **PREP (Preparation)**; BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of dipyridodiazepinones as reverse transcriptase inhibitors)

RN 497067-11-5 CAPLUS

CN 1-Naphthaleneacetic acid, 4-[2-(11-ethyl-6,11-dihydro-5-methyl-6-oxo-5H-dipyrido[3,2-b:2',3'-e][1,4]diazepin-8-yl)ethoxy]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 16 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:117781 CAPLUS
DOCUMENT NUMBER: 138:153326
TITLE: Novel vinyl carboxylic acid derivatives and their use as antidiabetics agents
INVENTOR(S): Jeppesen, Lone; Bury, Paul Stanley; Mogensen, John Patrick; Pettersson, Ingrid; Sauerberg, Per
PATENT ASSIGNEE(S): Novo Nordisk A/S, Den.
SOURCE: PCT Int. Appl., 72 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003011807	A1	20030213	WO 2002-DK471	20020705

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: DK 2001-1154 A 20010730
OTHER SOURCE(S): MARPAT 138:153326
GI

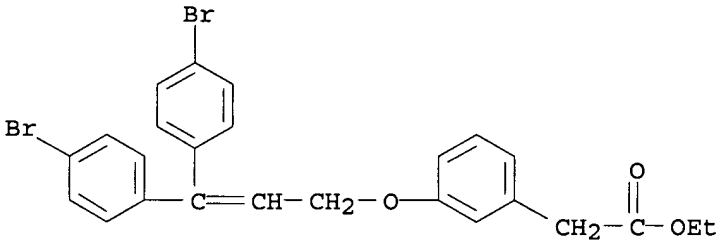
* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB Title compds. I [X = (un)substituted aryl, fluorenyl, heteroaryl; Y = aryl, alkyl, cycloalkyl, etc.; Z = O, X; Ar = arylene; Q = (CH2)0-3; R1 =

H, halo, alkyl, cycloalkyl, etc.; R2 = H, alkyl, cycloalkyl, alkenyl, alkynyl, etc. provided that X and Y independently is not a ring] are prepd. For instance, tri-Et phosphonoacetate was reacted with 4,4'-dibromobenzophenone (THF, NaH) to give the unsatd. ester. This was reduced to the allylic alc. (PhMe, DIBAL-H) and used to alkylate 3-(3-hydroxyphenyl)propionic acid Et ester (prepn. given; THF, n-Bu3P, azodicarboxylic dipiperidide, 48 h) to give II. I are selective agonists for the PPAR.delta. receptor and are useful in the treatment of diabetes.

IT **494865-09-7P**
RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); **PREP (Preparation)**; **PREP (Preparation)**; RACT (Reactant or reagent); USES (Uses)
(prepn of vinyl carboxylic acid derivs. as PPAR-.delta. agonists)

RN 494865-09-7 CAPLUS
CN Benzeneacetic acid, 3-[[3,3-bis(4-bromophenyl)-2-propenyl]oxy]-, ethyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 17 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:97411 CAPLUS
DOCUMENT NUMBER: 138:137162
TITLE: Preparation of ureido-carboxamido thiophenes as inhibitors of IKK2 kinase
INVENTOR(S): Faull, Alan; Johnstone, Craig; Morley, Andrew; Poyser, Jeffrey Philip
PATENT ASSIGNEE(S): Astrazeneca A.B., Swed.
SOURCE: PCT Int. Appl., 180 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

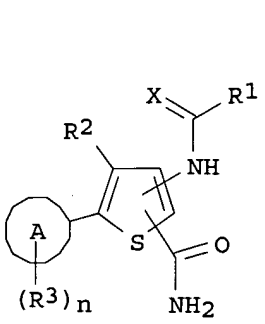
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003010158	A1	20030206	WO 2002-SE1403	20020719

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

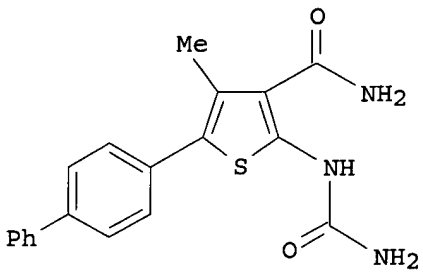
PRIORITY APPLN. INFO.: SE 2001-2616 A 20010725
OTHER SOURCE(S): MARPAT 138:137162

09/ 943,037 -- CLAIM 13

GI



I



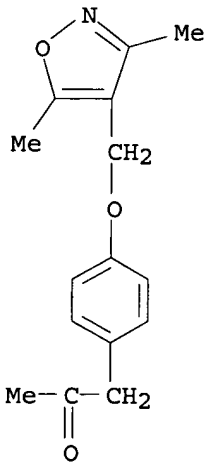
II

AB Title compds. I [R1 = NH2, (un)substituted methyl; X = O, S; R2 = H, halo, CN, NO2, amino, carboxamido, carboxy, etc.; A = Ph, 5-7-membered (un)substituted heteroarom. ring; n = 1-2; R3 = W-Y-Z; W = O, SO0-2; amino, CH2(O), bond; Y = (CH2)0-2-T-(CH2)0-2; T = O, CO, alkyl; Z = Ph, 5-6-membered (un)substituted heteroarom. ring, etc.; with specific exceptions] are prepd. For instance, (1,1'-biphenyl-4-yl)acetone, cyanoacetamide, sulfur and morpholine in EtOH at 55.degree. are reacted to give 2-Amino-4-methyl-5-(1,1'-biphenyl-4-yl)-3-thiophencarboxamide. This intermediate is treated with trichloroacetyl isocyanate and ammonia in MeOH to give example compd. II. Compds. of the invention have IC50 < 10 .mu.M for IKK2 kinase. I are useful for the treatment of inflammatory diseases.

IT **494771-45-8P**, 4-[(3,5-Dimethylisoxazol-4-yl)methoxy]phenyl acetone
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(prepn. of ureido-carboxamido thiophenes as inhibitors of IKK2 kinase)

RN 494771-45-8 CAPLUS

CN 2-Propanone, 1-[4-[(3,5-dimethyl-4-isoxazolyl)methoxy]phenyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 18 OF 40 CAPLUS COPYRIGHT 2003 ACS

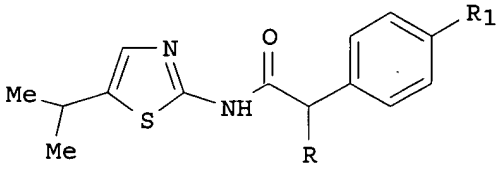
09/ 943,037 -- CLAIM 13

ACCESSION NUMBER: 2003:76736 CAPLUS
DOCUMENT NUMBER: 138:137299
TITLE: Preparation of phenylacetamido-thiazole derivatives as antitumor agents
INVENTOR(S): Pevarello, Paolo; Amici, Raffaella; Villa, Manuela; Salom, Barbara; Vulpetti, Anna; Varasi, Mario; Brasca, Maria Gabriella; Traquandi, Gabriella; Nesi, Marcella
PATENT ASSIGNEE(S): Pharmacia Italia S.P.A., Italy
SOURCE: PCT Int. Appl., 59 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003008365	A2	20030130	WO 2002-EP7289	20020702

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-907947 A 20010719
US 2002-357642P P 20020220
OTHER SOURCE(S): MARPAT 138:137299
GI



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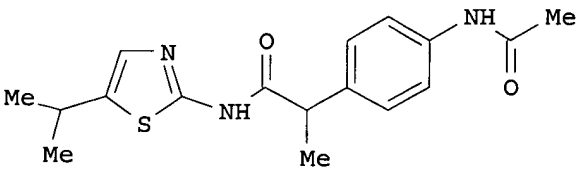


II

AB Phenylacetamido-thiazole derivs. [I; wherein R = H, (C1-C4)alkyl; R1 = 5-membered heterocycle contg. 1 or 2 heteroatoms selected from O and N, or amido group] were prepd. For example, (2S)-2-[4-(acetamido)phenyl]-N-(5-isopropyl-1,3-thiazol-2-yl)propanamide [2(S)-(II)] was prepd. by the provided method. The compds. are active as cdk/cyclin inhibitors and,

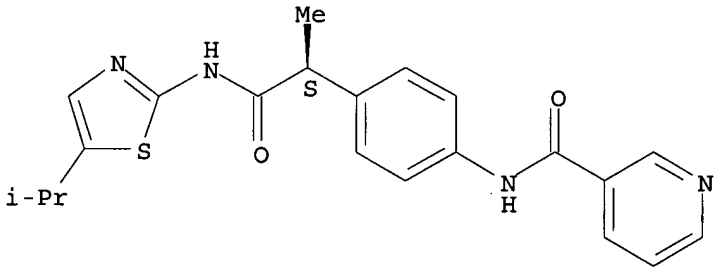
thus, are useful for treating cell proliferative disorders assocd. with an altered cell dependent kinase activity. The proliferative disorders include cancer and a wide variety of other conditions, such as Alzheimer's disease, viral infections, autoimmune diseases, and neurodegenerative disorders. For example, compd. II, when tested against cdk2/cyclin A, showed an inhibitory activity, expressed as IC50, of 11 nM.

IT **492445-42-8P**, N-(4-[(1S)-2-[(5-Isopropylthiazol-2-yl)amino]-1-methyl-2-oxoethyl]phenyl)nicotinamide
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of phenylacetamido-thiazole derivs. as cdk/cyclin inhibitors)

RN 492445-42-8 CAPLUS

CN 3-Pyridinecarboxamide, N-[4-[(1S)-1-methyl-2-[[5-(1-methylethyl)-2-thiazolyl]amino]-2-oxoethyl]phenyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



L4 ANSWER 19 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:58051 CAPLUS

DOCUMENT NUMBER: 138:136938

TITLE: Preparation of N-(3-amino-2-hydroxy-propyl) substituted alkanamides as inhibitors of the beta secretase enzyme for treating Alzheimer's disease

INVENTOR(S): Gailunas, Andrea; Hom, Roy; John, Varghese; Maillard, Michel; Chrusciel, Robert Alan; Fisher, Jed; Jacobs, Jon; Freskos, John N.; Brown, David L.; Fobian, Yvette M.

PATENT ASSIGNEE(S): Elan Pharmaceuticals, Inc., USA; Pharmacia & Upjohn Company

SOURCE: PCT Int. Appl., 205 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003006423	A1	20030123	WO 2002-US22255	20020711

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,

09/ 943,037 -- CLAIM 13

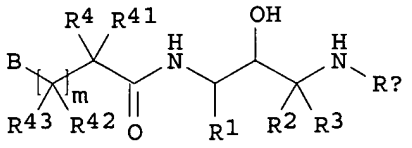
NE, SN, TD, TG

PRIORITY APPLN. INFO.:

US 2001-304525P	P	20010711
US 2001-308756P	P	20010730
US 2001-341341P	P	20011217
US 2001-341416P	P	20011217
US 2001-344872P	P	20011221
US 2001-380574P	P	20011221

OTHER SOURCE(S): MARPAT 138:136938

GI



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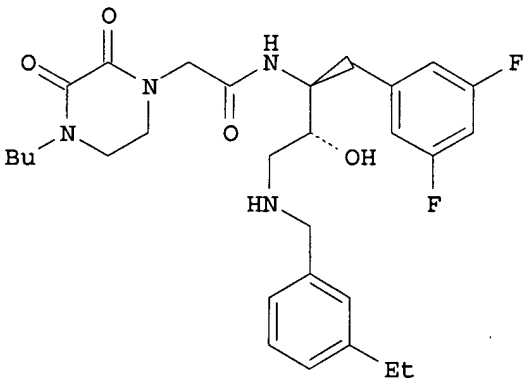


II

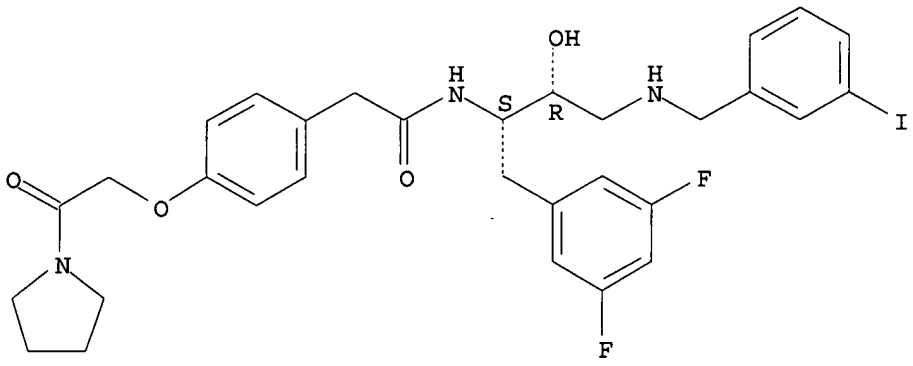
AB The title compds. [I; m = 0-5; B = (un)substituted (hetero)aryl, (hetero)cycloalkyl; R4, R41 = H, CN, OCF3, etc.; R4 and R41 together = O; R42, R43 = H, CN, OCF3, etc.; R42 and R43 together = O; R1 = (CH2)1-2 S(O)0-2alkyl, substituted alkyl, aryl, etc.; R2 = H, alkyl, alkenyl, etc.; R3 = H, alkenyl, alkynyl, etc.; R2 and R3 taken together with the carbon atom to which they are attached form 3-7 membered carbocycle where one atom is optionally a heteroatom; Rc = H, alkyl, alkenyl, etc.], useful in treating Alzheimer's disease and other similar diseases characterized by deposition of A beta peptide in a mammal, were prepd. E.g., a multi-step synthesis of (1S,2R)-II.HCl, starting from N-butylethylenediamine and di-Et oxalate, was given. The compds. I showed IC50 of < 50 .mu.M against .beta.-secretase. The compds. I are useful in pharmaceutical compns. and methods of treatment to reduce A beta peptide formation.

IT **488844-51-5P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of N-(3-amino-2-hydroxy-propyl) substituted alkanamides as inhibitors of the beta secretase enzyme for treating Alzheimer's disease)

RN 488844-51-5 CAPLUS

CN Benzeneacetamide, N-[(1S,2R)-1-[(3,5-difluorophenyl)methyl]-2-hydroxy-3-[[(3-iodophenyl)methyl]amino]propyl]-4-[2-oxo-2-(1-pyrrolidinyl)ethoxy]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 20 OF 40 CAPLUS COPYRIGHT 2003 ACS

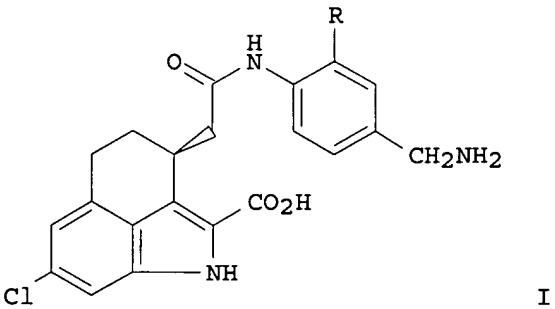
ACCESSION NUMBER: 2003:55654 CAPLUS
DOCUMENT NUMBER: 138:255050

TITLE: Tricyclic Indole-2-carboxylic Acids: Highly in Vivo Active and Selective Antagonists for the Glycine Binding Site of the NMDA Receptor

AUTHOR(S): Katayama, Seiji; Ae, Nobuyuki; Kodo, Toru; Masumoto, Shuji; Hourai, Shinji; Tamamura, Chika; Tanaka, Hiroyasu; Nagata, Ryu
CORPORATE SOURCE: Research Division, Sumitomo Pharmaceuticals Co., Ltd., Konohana, Osaka, 554-0022, Japan

SOURCE: Journal of Medicinal Chemistry (2003), 46(5), 691-701
CODEN: JMCMAR; ISSN: 0022-2623
PUBLISHER: American Chemical Society
DOCUMENT TYPE: Journal
LANGUAGE: English

GI



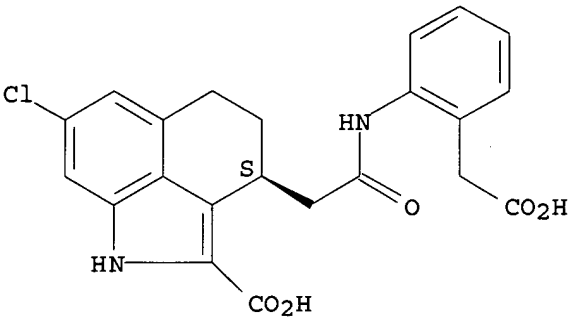
I

AB A series of tricyclic indole-2-carboxylic acid derivs. were synthesized and evaluated by the radioligand binding assay and the anticonvulsant effects in the mouse NMDA-induced seizure model. Among them, I [R = OCH2CO2H, CH2CO2H, (R)-OCHMeCO2H] showed high affinity to the NMDA-glycine binding site. The abs. configuration of the parent acid was confirmed by X-ray crystallog. anal. In particular, I [R = (R)-CHMeCO2H] was found to be a highly active glycine antagonist for both in vitro and in vivo assays (Ki = 1.0 .+-. 0.1 nM, ED50 = 2.3 mg/kg, i.v.) and also showed high selectivity for the glycine site. In addn., I [R = (R)-CHMeCO2H] was sol. enough in aq. media (>10 mg/mL at pH 7.4) to use for medications by i.v. injection.

09/ 943,037 -- CLAIM 13

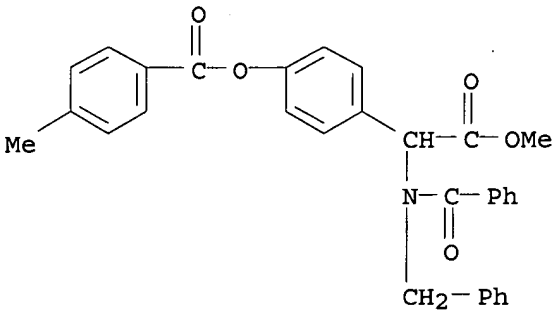
IT **502481-57-4P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); **PREP (Preparation)**; **PREP (Preparation)**
(prepn. of benzindoleacetanilides as selective antagonists for the glycine binding site of the NMDA receptor)
RN 502481-57-4 CAPLUS
CN Benz[cd]indole-2-carboxylic acid, 3-[2-[[2-(carboxymethyl)phenyl]amino]-2-oxoethyl]-7-chloro-1,3,4,5-tetrahydro-, (3S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).



REFERENCE COUNT: 60 THERE ARE 60 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 21 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:45393 CAPLUS
DOCUMENT NUMBER: 138:271934
TITLE: The development of a catalytic synthesis of munchnones: a simple four-component coupling approach to .alpha.-amino acid derivatives
AUTHOR(S): Dhawan, Rajiv; Dghaym, Rania D.; Arndtsen, Bruce A.
CORPORATE SOURCE: Department of Chemistry, McGill University, Montreal, QC, H3A 2K6, Can.
SOURCE: Journal of the American Chemical Society (2003), 125(6), 1474-1475
CODEN: JACSAT; ISSN: 0002-7863
PUBLISHER: American Chemical Society
DOCUMENT TYPE: Journal
LANGUAGE: English
AB A new palladium-catalyzed route to prep. 1,3-oxazolium-5-oxides (i.e., munchnones) directly from imine, carbon monoxide, and acid chloride building blocks has been developed. This provides a straightforward catalytic synthesis of munchnones and is amenable to generating a diverse range of products by simple modification of the imine or acid chloride starting materials. Munchnones are vital synthetic intermediates to a variety of heterocyclic and peptide-based mols. As such, this methodol. has been utilized to design a new catalytic synthesis of .alpha.-amino acid derivs. via a one-pot coupling of imines, carbon monoxide, and acid chloride followed by alc. The latter represents the first reported catalytic synthesis of .alpha.-amino acids directly from imine and carbon monoxide building blocks.
IT **501443-87-4P**
RL: SPN (Synthetic preparation); **PREP (Preparation)**
(one-pot synthesis of amino acid derivs. via coupling of imines, carbon monoxide, and acid chloride followed by alc. based on development of catalytic synthesis of munchnones)
RN 501443-87-4 CAPLUS
CN Benzeneacetic acid, .alpha.-[benzoyl(phenylmethyl)amino]-4-[(4-methylbenzoyl)oxy]-, methyl ester (9CI) (CA INDEX NAME)



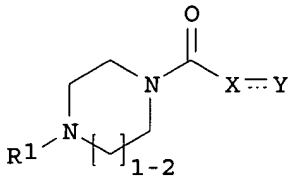
REFERENCE COUNT: 33 THERE ARE 33 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 22 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:42258 CAPLUS
DOCUMENT NUMBER: 138:106714
TITLE: Preparation of substituted piperazines and diazepanes as histamine H3 receptor agonists
INVENTOR(S): Doerwald, Florencio Zaragoza; Andersen, Knud Erik; Sorensen, Jan Lindy
PATENT ASSIGNEE(S): Novo Nordisk A/S, Den.; Boehringer Ingelheim International G.m.b.H.
SOURCE: PCT Int. Appl., 182 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

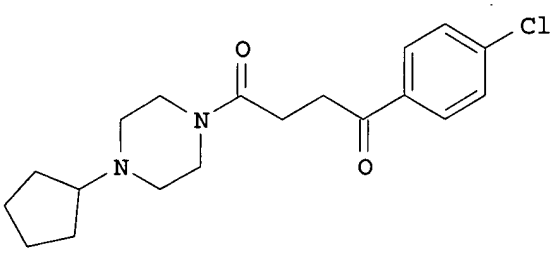
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003004480	A2	20030116	WO 2002-DK438	20020627

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: DK 2001-1046 A 20010702
DK 2001-1878 A 20011214
OTHER SOURCE(S): MARPAT 138:106714
GI



I



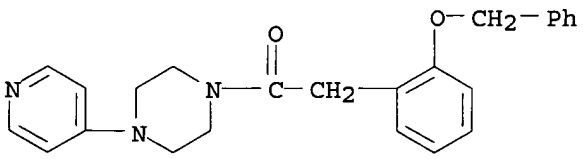
II

AB The title compds. [I; R1 = alkyl, alkenyl, cycloalkyl, etc.; X = (CH2)mZn(CR2R3)o(CH2)pVq (wherein m, p = 0-4; n, o, q = 0-1; Z, V = O, NH, CO, etc.; R2, R3 = H, alkyl, OH); Y = (un)substituted (hetero)aryl, cycloalkyl, cycloalkenyl; with the provisos], useful in the treatment of diseases and disorders related to overweight or obesity such as eating disorders, diabetes and impaired glucose tolerance (IGT), were prepd. and formulated. Thus, amidation of 3-(4-chlorobenzoyl)-3-oxopropionic acid with 1-cyclopentylpiperazine afforded 88% II.HCl.

IT **485795-49-1P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of substituted piperazines and diazepanes as histamine H3 receptor ligands)

RN 485795-49-1 CAPLUS

CN Piperazine, 1-[[2-(phenylmethoxy)phenyl]acetyl]-4-(4-pyridinyl)- (9CI) (CA INDEX NAME)



L4 ANSWER 23 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:42245 CAPLUS

DOCUMENT NUMBER: 138:106689

TITLE: Preparation of thiazolylamino benzamide derivatives as modulators of cell proliferation and inhibitors of protein kinases

INVENTOR(S): Chu, Shao Song; Alegria, Larry Andrew; Bleckman, Ted Michael; Chong, Wesley K. M.; Duvadie, Rohit K.; Li, Lin; Reich, Siegfried H.; Romines, William H.; Wallace, Michael B.; Yang, Yi

PATENT ASSIGNEE(S): Agouron Pharmaceuticals, Inc., USA

SOURCE: PCT Int. Appl., 163 pp.
CODEN: PIXXD2

09/ 943,037 -- CLAIM 13

DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

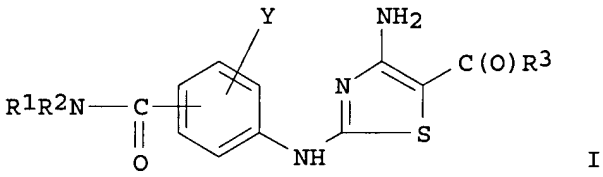
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003004467	A2	20030116	WO 2002-US21280	20020705

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-303679P P 20010706
US 2001-305274P P 20010713

OTHER SOURCE(S): MARPAT 138:106689
GI



I

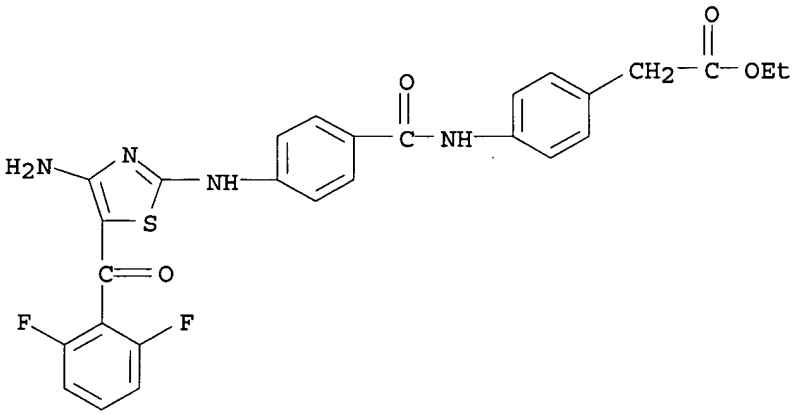
AB Aminothiazole compds. with mono-/di-substituted benzamides (shown as I; variables described below; e.g. 4-[[4-amino-5-(2,6-difluorobenzoyl)thiazol-2-yl]amino]-N-(2-morpholin-4-ylethyl)benzamide), and their pharmaceutically acceptable salts, pharmaceutically acceptable prodrugs, pharmaceutically active metabolites, and pharmaceutically acceptable salts of said metabolites are described. These agents modulate and/or inhibit the cell proliferation and activity of protein kinases and are useful as pharmaceuticals for treating malignancies and other disorders. Inhibitory activities towards three cyclin complexes of protein kinases, phosphorylated FGF receptor and/or LCK tyrosine kinase and/or cytotoxicity towards the HCT-116 cancer cell line are reported for hundreds of I, many of which were prepd. combinatorially. For I: R1 and R2 are each independently H, or an alkyl, alkenyl, alkynyl, heteroalkyl, alkoxy, aminoalkyl, aryl, heteroaryl, cycloalkyl, or heterocycloalkyl group unsubstituted or substituted with .gtoreq.1 substituents listed in the claims, or R1 or R2, together with the N-C(O) and two adjacent C atoms of the Ph ring of I, forms a 5- or 6-membered ring structure fused to the Ph ring of I and unsubstituted or substituted with .gtoreq.1 substituents listed in the claims, or R1 and R2, taken together with the N atom to which they are bonded, form a monocyclic or fused or nonfused polycyclic structure which may contain 1-3 addnl. heteroatoms, the structure being unsubstituted or substituted with .gtoreq.1 substituents listed in the claims. R3 is an aryl, heteroaryl, alkyl, or cycloalkyl group, unsubstituted or substituted with .gtoreq.1 substituents listed in the claims. Y is H, alkyl, heteroalkyl, haloalkyl, halocycloalkyl, haloheterocycloalkyl, cycloalkyl, heterocycloalkyl, -NO2, -NH2, -N-OH, N-ORc, -CN, -(CH2)z-CN (z is 0-4), halogen, -OH, -O-Ra-O-, -ORb, -CO-R, -O-CO-Rc, -CO-ORc, -O-CO-OR, -O-OR, =O, =S, -NRdRe, -CO-NRdRe, -O-CO-NRdRe, -NRc-CO-Re, -NR-CO-OR, -CO-NRc-CO-Rd, -O-SO2-Re, -O-SO-R,

-O-S-Re, -S-CO-Rc, -SO-CO-ORc, -SO-CO-OR, -O-SO3, -NRc-SRd, -NRc-SO-Rd, NRc-SO2-Rd, -CO-SRc, -CO-SO-Re, -CO-OSO2-Rc, -CS-Rc, -CSO-R, -CSO2-R,, -NRc-CS-Rd, -O-CS-Re, -O-CSO-Rc, -O-SO2-Re, -OS2-NRdRe, -SO-NRdRe, -S-NRdRe, -NRd-CSO2-Rd, - NRc-CSO-Rd, -NRc-CS-Rd, -SH, -S-Rb, and -PO2-ORc (Ra, etc. defined in claims). Although the methods of prepn. are not claimed, .apprx.80 example prepns. of I are included and directions are given for combinatorial prepn. of 396 I.

IT **486416-83-5P**, 4-[[4-Amino-5-(2,6-difluorobenzoyl)thiazol-2-yl]amino]-N-(4-((ethoxycarbonyl)methyl)phenyl)benzamide
RL: CPN (Combinatorial preparation); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); CMBI (Combinatorial study); **PREP (Preparation)**; USES (Uses)
(drug candidate; prepn. of thiazolylamino benzamide derivs. as modulators of cell proliferation and inhibitors of protein kinases)

RN 486416-83-5 CAPLUS

CN Benzeneacetic acid, 4-[[4-[[4-amino-5-(2,6-difluorobenzoyl)-2-thiazolyl]amino]benzoyl]amino]-, ethyl ester (9CI) (CA INDEX NAME)



L4 ANSWER 24 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2003:22837 CAPLUS

DOCUMENT NUMBER: 138:73089

TITLE: Preparation of N-phenyloxyphenylcarboxamides as anticholesteremic agents

INVENTOR(S): Schmeck, Carsten; Mueller, Ulrich; Schmidt, Gunter; Pernerstorfer, Josef; Bischoff, Hilmar; Kretschmer, Axel; Voehringer, Verena; Faeste, Christiane; Haning, Helmut; Woltering, Michael

PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 111 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

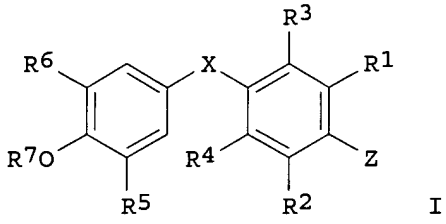
FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003002519	A1	20030109	WO 2002-EP6638	20020617

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU,

TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
DE 10131462 A1 20030109 DE 2001-10131462 20010629
PRIORITY APPLN. INFO.: DE 2001-10131462 A 20010629
OTHER SOURCE(S): MARPAT 138:73089
GI



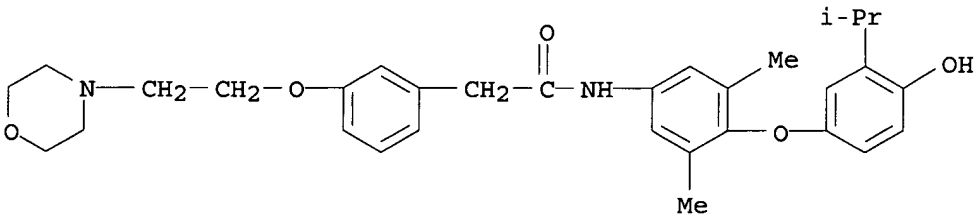
I

AB Title compds. [I; X = O, S, SO, SO2, CH2, CHF, CF2, etc.; R1, R2 = H, alkyl; R3, R4 = H, halo, cyano, alkyl, CF3, CHF2, CH2F, vinyl, cycloalkyl; R5 = H, alkyl, halo; R6 = alkyl, Br, Cl, etc.; R7 = H, alkyl, alkanoyl; Z = NHSO2R36, NHCO2R37, NHCONR38R39, NHCOR40; R36-R40 = (substituted) alkyl, alkenyl, cycloalkyl, aryl, heterocyclyl, heteroaryl], were prepd. as anticholesteremic agents (no data). Thus, 4-(4-[tert-butyl(dimethyl)silyloxy]-3-isopropylphenoxy)-3,5-dimethylaniline (prepn. given) in THF was stirred with hexanoyl chloride and dimethylaminopyridine for 16 h at room temp. followed by further addn. of hexanoyl chloride and stirring to give 73% N-[4-(4-hydroxy-3-isopropylphenoxy)-3,5-dimethylphenyl]hexanamide.

IT **482332-53-6P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of phenyloxyphenylcarboxamides as anticholesteremic agents)

RN 482332-53-6 CAPLUS

CN Benzeneacetamide, N-[4-[4-hydroxy-3-(1-methylethyl)phenoxy]-3,5-dimethylphenyl]-3-[2-(4-morpholinyl)ethoxy]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 9 THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 25 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:11412 CAPLUS
DOCUMENT NUMBER: 138:221377
TITLE: Total synthesis of (.+-.)-FR66979
AUTHOR(S): Ducray, Richard; Ciufolini, Marco A.
CORPORATE SOURCE: Laboratoire de Synthese et Methodologie Organiques

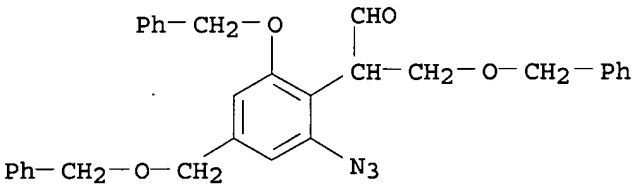
CNRS UMR 5078 Universite Claude Bernard Lyon 1, Villeurbanne, 69622, Fr.
SOURCE: Angewandte Chemie, International Edition (2002), 41(24), 4688-4691
CODEN: ACIEF5; ISSN: 1433-7851
PUBLISHER: Wiley-VCH Verlag GmbH & Co. KGaA
DOCUMENT TYPE: Journal
LANGUAGE: English

AB The total synthesis of the antitumor agent (.+-.)-FR66979 is described. An unusual fragmentation of a silylated aziridine orchestrated by a preliminary homo-Brook transposition is the key step.

IT **501000-24-4P**
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(prepn. of (.+-.)-FR66979 from a substituted benzene via a key homo-Brook aziridine fragmentation)

RN 501000-24-4 CAPLUS

CN Benzeneacetaldehyde, 2-azido-6-(phenylmethoxy)-.alpha.,4-bis[(phenylmethoxy)methyl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 57 THERE ARE 57 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 26 OF 40 CAPLUS COPYRIGHT 2003 ACS

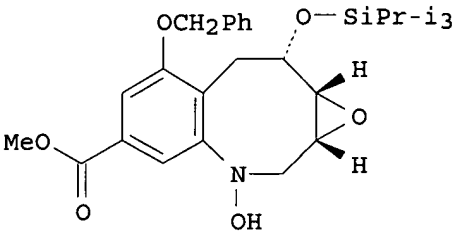
ACCESSION NUMBER: 2003:11411 CAPLUS
DOCUMENT NUMBER: 138:271420

TITLE: Facile construction of N-hydroxybenzazocine: enantioselective total synthesis of (+)-FR900482

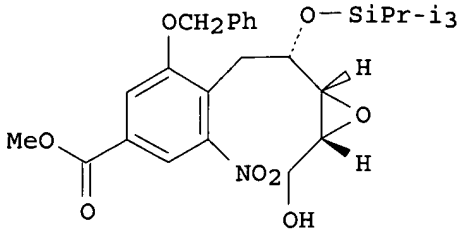
AUTHOR(S): Suzuki, Masashi; Kambe, Mika; Tokuyama, Hidetoshi; Fukuyama, Tohru
CORPORATE SOURCE: Graduate School of Pharmaceutical Sciences, The University of Tokyo, Tokyo, 113-0033, Japan

SOURCE: Angewandte Chemie, International Edition (2002), 41(24), 4686-4688
CODEN: ACIEF5; ISSN: 1433-7851
PUBLISHER: Wiley-VCH Verlag GmbH & Co. KGaA
DOCUMENT TYPE: Journal
LANGUAGE: English

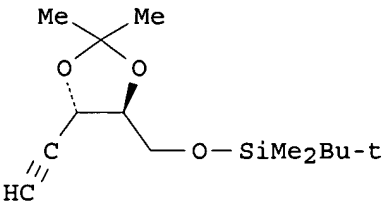
GI



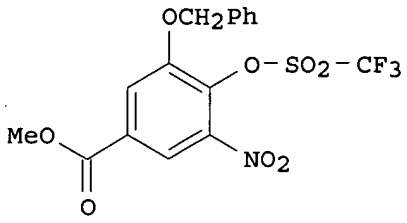
II



III



IV



V

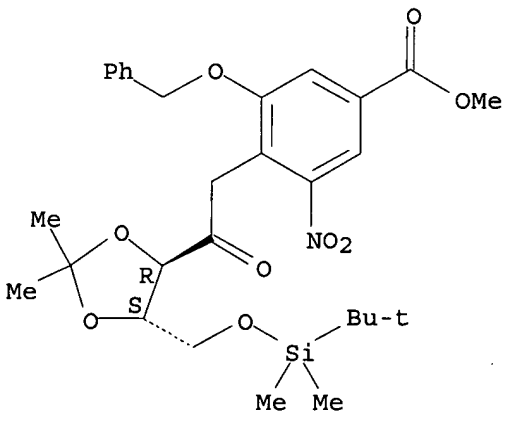
AB The enantioselective total synthesis of (+)-FR900482 (I) is presented via the facile construction of the N-hydroxybenzazocine intermediate II. Thus, the epoxy alc. III was synthesized in many steps starting from a Sonogashira coupling of acetylene IV with aryl triflate V. III was then oxidized to the aldehyde and hydrogenated to give II in 89% overall yield. II was then converted to I in 18 steps.

IT **503311-39-5P**
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(enantioselective total synthesis of (+)-FR900482 via intramol. reductive hydroxylamination of epoxy alc. to give N-hydroxybenzazocine intermediate)

RN 503311-39-5 CAPLUS

CN L-threo-2-Pentulose, 1-deoxy-5-O-[(1,1-dimethylethyl)dimethylsilyl]-1-[4-(methoxycarbonyl)-2-nitro-6-(phenylmethoxy)phenyl]-3,4-O-(1-methylethylidene)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 29 THERE ARE 29 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 27 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:5930 CAPLUS
DOCUMENT NUMBER: 138:73261
TITLE: Preparation of heterocyclyliminophenyl compounds as agricultural and horticultural fungicides and insecticides
INVENTOR(S): Niki, Toshio; Mizukoshi, Takashi; Takahashi, Hiroaki; Satow, Jun; Ogura, Tomoyuki; Yamagishi, Kazuhiro; Suzuki, Hiroyuki; Hayasaka, Fumio
PATENT ASSIGNEE(S): Nissan Chemical Industries, Ltd., Japan
SOURCE: PCT Int. Appl., 508 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

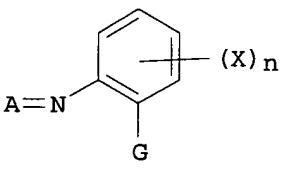
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003000659	A1	20030103	WO 2002-JP6424	20020626

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.:

JP 2001-192285	A	20010626
JP 2001-193428	A	20010626
JP 2001-385120	A	20011218
JP 2001-386846	A	20011220
JP 2002-90213	A	20020328

OTHER SOURCE(S): MARPAT 138:73261
GI

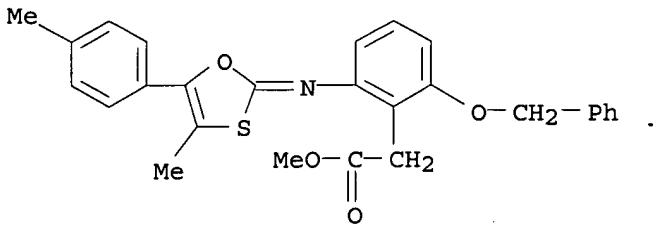


I

AB The title compds. I [A is an optionally substituted heterocycle; X is hydrogen or the like; and G is CH2COOMe, N(Me)COOMe, or the like; n = 0 - 4] are prepd. Compds. of this invention at 500 ppm gave .gtoreq. 70% control of Pyricularia oryzae.

IT **481059-92-1P**
RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of heterocyclyliminophenyl compds. as agricultural and horticultural fungicides and insecticides)

RN 481059-92-1 CAPLUS
CN Benzeneacetic acid, 2-[[4-methyl-5-(4-methylphenyl)-1,3-oxathiol-2-ylidene]amino]-6-(phenylmethoxy)-, methyl ester (9CI) (CA INDEX NAME)

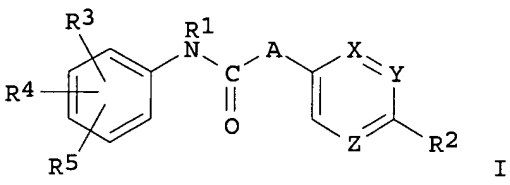


REFERENCE COUNT: 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 28 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:5925 CAPLUS
DOCUMENT NUMBER: 138:73087
TITLE: Preparation of N-acylanilines as thrombin inhibitors
INVENTOR(S): Priepke, Henning; Hauel, Norbert; Heckel, Armin; Ries, Uwe; Binder, Klaus; Zimmermann, Rainer; Stassen, Jean-Marie; Wienen, Wolfgang
PATENT ASSIGNEE(S): Boehringer Ingelheim Pharma K.-G., Germany
SOURCE: PCT Int. Appl., 88 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003000653	A1	20030103	WO 2002-EP6774	20020619
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10130374	A1	20030102	DE 2001-10130374	20010623

PRIORITY APPLN. INFO.: DE 2001-10130374 A 20010623
OTHER SOURCE(S): MARPAT 138:73087
GI



I

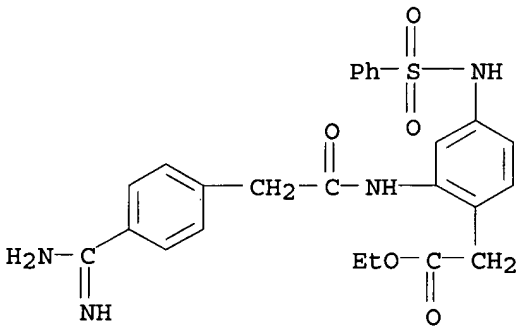
AB Title compds. [I; A = (substituted) CH2, (substituted) (interrupted) alkylene; R1 = H, (substituted) alkyl; R2 = cyano, aminomethyl, amidino; R3 = (substituted) alkyl, carboxyalkyl, CO2H, sulfonyl, etc., R4 = H, F, Cl, Br, I, CO2H, alkyl, carboxyalkyl, CF3, alkoxy; R5 = H, F, Cl, Br, I, alkyl, CF3; or R4R5 = alkyl; X, Y, Z = N, CH; whereby at least 1 of X, Y,

Z = CH] and tautomers, stereoisomers, mixts., prodrugs, and salts thereof were prepd. Thus, 4-[N-(2,5-dimethyl-4-[2-pyrrolidinocarbonyl]phenylamino carbonylmethyl)amino]benzonitrile was stirred with EtOH satd. with gaseous HCl for 48 h at room temp. followed by vacuum removal of solvent and stirring with (NH4)2CO3 in abs. EtOH for 48 h to give 100% 4-[N-(2,5-dimethyl-4-[2-pyrrolidinocarbonyl]phenylaminocarbonylmethyl)amin o]benzamidine. The latter had an ED200 in the a-PTT time of 0.65 .mu.M.

IT **481068-49-9P**
RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); **PREP (Preparation)**; **PREP (Preparation)**; RACT (Reactant or reagent); USES (Uses)
(prepn. of N-acylanilines as thrombin inhibitors)

RN 481068-49-9 CAPLUS

CN Benzeneacetic acid, 2-[[[4-(aminoiminomethyl)phenyl]acetyl]amino]-4-[(phenylsulfonyl)amino]-, ethyl ester, monohydrochloride (9CI) (CA INDEX NAME)



● HCl

REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 29 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2003:5711 CAPLUS
DOCUMENT NUMBER: 138:73536
TITLE: Preparation of peptides as dipeptidyl peptidase inhibitors for the treatment of diabetes
INVENTOR(S): Edmondson, Scott D.; Parmee, Emma; Weber, Ann E.; Xu, Jinyou
PATENT ASSIGNEE(S): Merck & Co., Inc., USA
SOURCE: PCT Int. Appl., 95 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003000180	A2	20030103	WO 2002-US19432	20020619

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

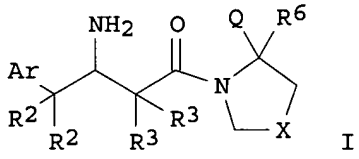
09/ 943,037 -- CLAIM 13

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-299464P P 20010620

OTHER SOURCE(S): MARPAT 138:73536

GI



I

AB Compds. I [X is CR10R11, S, SO, SO2, or CR9R10, where R9 is a carbamoyl group, R10, R11 are H, F, alkyl, haloalkyl, with the proviso that when X is CR9R10, Q and R8 are both H; Ar is (un)substituted Ph, naphthyl, thienyl, or benzothiophenyl; R2 is H, OH, halo, alkyl, haloalkyl or R22C is (halo)cycloalkyl; R3 is any group given for R2 except OH; Q is H, a carbamoyl group, or CN; R8 is H, alkyl, or haloalkyl] or their pharmaceutically-acceptable salts and prodrugs were prepd. as inhibitors of the dipeptidyl peptidase-IV enzyme (DP-IV) for treatment of DP-IV mediated diseases and conditions, such as non-insulin dependent diabetes mellitus. Thus, 1-[(3R)-3-amino-4-phenylbutanoyl]-N-(5-chloro-2-hydroxybenzyl)-L-prolinamide was prepd. by amidation of Boc-Pro-OH (Boc = tert-butoxycarbonyl) with 5-chloro-2-hydroxybenzylamine, deprotection, and coupling with N-Boc-(R)-.beta.-phenylalanine. Compds. of the invention generally have DP-IV inhibition consts. of < 10 .mu.M.

IT **479585-45-0P**

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); **PREP (Preparation)**; USES (Uses)

(prepn. of peptides as dipeptidyl peptidase inhibitors for treatment of diabetes)

RN 479585-45-0 CAPLUS

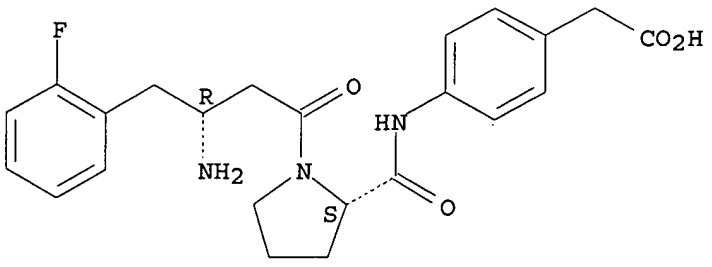
CN Benzeneacetic acid, 4-[[[(2S)-1-[(3R)-3-amino-4-(2-fluorophenyl)-1-oxobutyl]-2-pyrrolidinyl]carbonyl]amino]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 479585-44-9

CMF C23 H26 F N3 O4

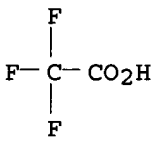
Absolute stereochemistry.



09/ 943,037 -- CLAIM 13

CM 2

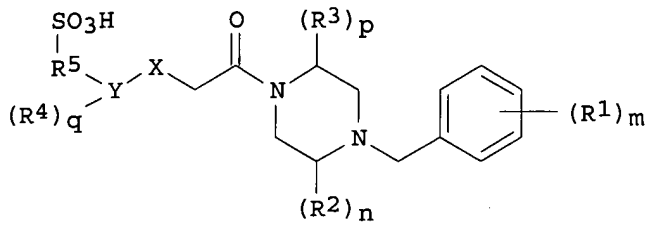
CRN 76-05-1
CMF C2 H F3 O2



L4 ANSWER 30 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:977801 CAPLUS
DOCUMENT NUMBER: 138:39299
TITLE: Preparation of [(2-piperazinyl-2-oxoethoxy)phenyl]alkanesulfonic acids and analogs as CCR1 receptor antagonists for treatment of inflammation and immune disorders
INVENTOR(S): Hayward, Matthew Merrill
PATENT ASSIGNEE(S): Pfizer Products Inc., USA
SOURCE: PCT Int. Appl., 44 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002102787	A2	20021227	WO 2002-IB1403	20020418
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
US 2003083335	A1	20030501	US 2002-175645	20020619

PRIORITY APPLN. INFO.: US 2001-299461P P 20010620
OTHER SOURCE(S): MARPAT 138:39299
GI



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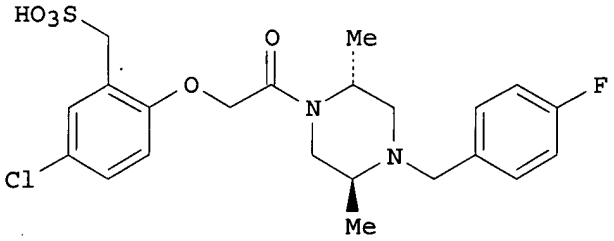


II

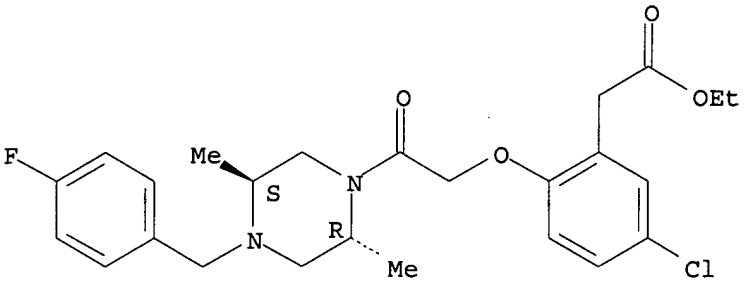
AB Title compds. I [wherein m = 0-5; n = 0-2; p = 0-2; q = 0-4; Y = (hetero)aryl; R1 = independently H, OH, halo, (fluoro)alkyl, (fluoro)alkoxy, hydroxyalkyl, CN, amino(alkyl), carboxy, alkanoyl(alkyl), or carbamoyl(alkyl); R2 and R3 = independently H, oxo, (fluoro)alkyl, aryl(alkyl), hydroxyalkyl, alkoxyalkyl, (alkyl)aminoalkyl, heterocycylalkyl, alkanoylaminoalkyl, alkoxycarbonylaminoalkyl, ureidoalkyl, alkylsulfonylaminoalkyl, heteroarylalkyl, or carbamoyl(alkyl); R4 = independently H, OH, halo, CN, CO2H, (alkyl)amino(alkyl), (fluoro)alkyl, alkoxy(alkyl), hydroxyalkyl, alkanoyl(alkyl), (hetero)aryl, aryloxy, carbamoyl(alkyl), (alkyl)carbamoyl, cycloalkyl, alkylsulfonyl, cyanoalkyl, alkanoylamino, or ureidoalkyl; R5 = alkyl; or pharmaceutically acceptable salts and prodrugs thereof] were prepd. as inhibitors of MIP-1.alpha. binding to its cysteine-cysteine chemokine receptor 1 (CCR1) on inflammatory and immunomodulatory cells. For instance, the reaction of 2-chloro-1-[4-(4-fluorobenzyl)-(2R,5S)-2,5-dimethylpiperazin-1-yl]ethanone (5-step synthesis given) with 5-chlorosalicylaldehyde, redn. of the aldehyde with NaBH4, chlorination with thionyl chloride, and conversion to the sulfonic acid with Na2SO3 gave (2R,5S)-II.bul.Na. In a bioassay for the ability to inhibit chemotaxis of various cells (THP-1 cells, primary human monocytes, or primary lymphocytes) in vitro, all six example compds. had IC50 values of less than 10 .mu.M. Thus, I are useful for the treatment of a variety of inflammation and other immune disorders (no data).

IT **478833-90-8P**, [5-Chloro-2-[2-[4-(4-fluorobenzyl)-2R,5S-dimethylpiperazin-1-yl]-2-oxoethoxy]phenyl]acetic acid ethyl ester
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(intermediate; prepn. of [(piperazinyloxoethoxy)phenyl]alkanesulfonic acids and analogs as CCR1 receptor antagonists for treatment of inflammation and immune disorders)

RN 478833-90-8 CAPLUS

CN Benzeneacetic acid, 5-chloro-2-[2-[(2R,5S)-4-[(4-fluorophenyl)methyl]-2,5-dimethyl-1-piperazinyl]-2-oxoethoxy]-, ethyl ester (9CI) (CA INDEX NAME)

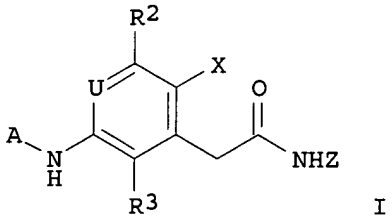
Absolute stereochemistry.



L4 ANSWER 31 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:965130 CAPLUS
DOCUMENT NUMBER: 138:39286
TITLE: Preparation of 2-(pyridin-4-yl)acetamides as thrombin inhibitors
INVENTOR(S): Barrow, James C.; Coburn, Craig; Selnick, Harold G.; Ngo, Phung L.
PATENT ASSIGNEE(S): USA
SOURCE: U.S. Pat. Appl. Publ., 61 pp.
CODEN: USXXCO
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 2002193398	A1	20021219	US 2002-71422	20020208

PRIORITY APPLN. INFO.: US 2001-267960P P 20010209
OTHER SOURCE(S): MARPAT 138:39286
GI



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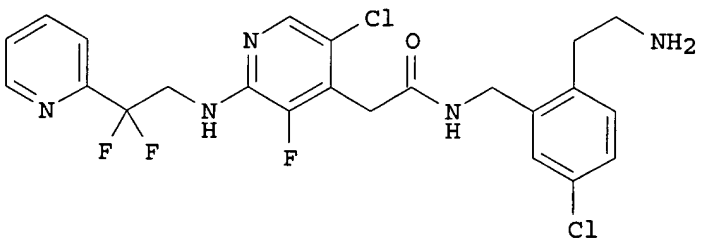


II

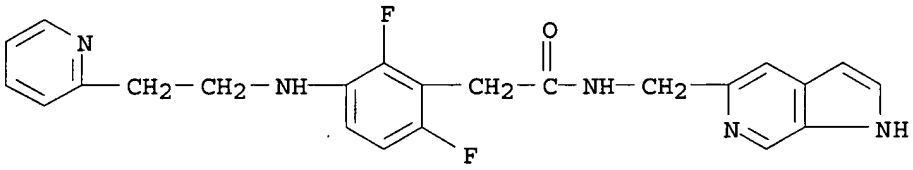
AB The title compds. [I; U = N, CH; A = CH2CY2R1, SO2CH2R1; R1 = (un)substituted unsatd. 6-membered non-heterocyclyl, satd. 6-membered heterocyclyl, 1-oxidopyridyl; R2 = H, F; R3 = H, halo; X = H, halo, alkyl, CN, CF3; Y = H, alkyl, F; Z = CR12R13(CH2)0-1R4; R4 = (un)substituted

unsatd. 6-membered non-heterocyclyl, unsatd. 6-membered monocyclic heterocyclyl, unsatd. 9-10 membered bicyclic heterocyclyl, CH2CONHC(:NH)NH2; R12, R13 = H, alkyl] and their salts, useful in inhibiting thrombin and treating blood coagulation and cardiovascular disorders, were prepd. and formulated. E.g., a multi-step synthesis of II which showed Ki of < 20 nM against human thrombin, was given.

IT **478618-18-7P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); **PREP (Preparation)**; BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of 2-(pyridin-4-yl)acetamides as thrombin inhibitors)

RN 478618-18-7 CAPLUS

CN Benzeneacetamide, 2,6-difluoro-3-[[2-(2-pyridinyl)ethyl]amino]-N-(1H-pyrrolo[2,3-c]pyridin-5-ylmethyl)- (9CI) (CA INDEX NAME)



L4 ANSWER 32 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:964316 CAPLUS

DOCUMENT NUMBER: 138:39100

TITLE: Preparation of N-arylphenylacetamide derivatives as analgesics and antiinflammatory agents

INVENTOR(S): Morie, Toshiya; Adachi, Keiji; Niidome, Kazumi; Kawashima, Katsuyoshi; Shimizu, Isao; Ishii, Daisuke

PATENT ASSIGNEE(S): Dainippon Pharmaceutical Co., Ltd., Japan

SOURCE: PCT Int. Appl., 126 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002100819	A1	20021219	WO 2002-JP5586	20020606

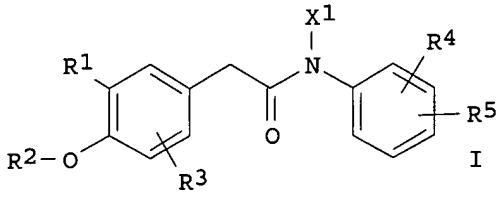
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: JP 2001-176252 A 20010611

OTHER SOURCE(S): MARPAT 138:39100

GI

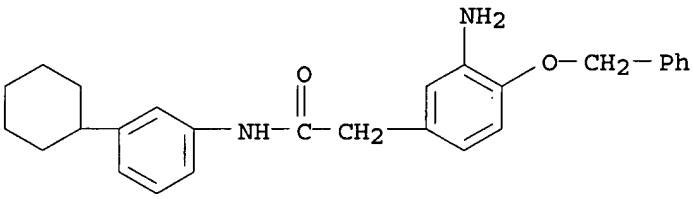


AB Title compds. I [wherein R1 represents C1-6 alkoxy, etc.; R2 represents hydrogen, -(CH2)m-N(R6)(R7) (wherein m is an integer of from 1 to 4; R6 represents hydrogen, C1-4 alkyl, etc.; and R7 represents hydrogen, etc.); R3 represents hydrogen, halogeno, etc.; R4 represents C6-10 alkyl, -Y-R8 (wherein Y represents a single bond, C1-6 alkylene, C2-6 alkenylene, C2-6 alkynylene, etc.; and R8 represents aryl, C3-8 cycloalkyl, C6-15 polycycloalkyl, etc.), etc.; R5 represents hydrogen, etc.; and X1 represents hydrogen] and their physiol. acceptable salts, hydrates, or solvates, useful as analgesics and antiinflammatory agents, are prepd. N-(3-cyclohexylphenyl)-4-hydroxy-3-methoxyphenylacetamide (II) was prepd. from reaction of 4-hydroxy-N-(3-iodophenyl)-3-methoxyphenylacetamide with cyclohexylzinc bromide in THF in the presence of tetrakis(triphenylphosphine)palladium. II showed analgesic activity superior to that of capsaicin. Pharmaceutical formulations contg. I were described.

IT **478400-70-3P**
RL: PAC (Pharmacological activity); RCT (Reactant); **PREP (Preparation)**; THU (Therapeutic use); **PREP (Preparation)**; **PREP (Preparation)**; RACT (Reactant or reagent); USES (Uses)
(prepn. of N-arylphenylacetamide derivs. as analgesics and antiinflammatory agents)

RN 478400-70-3 CAPLUS

CN Benzeneacetamide, 3-amino-N-(3-cyclohexylphenyl)-4-(phenylmethoxy)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 12 THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 33 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:964190 CAPLUS

DOCUMENT NUMBER: 138:39272

TITLE: Preparation of 3-(oxazolylalkoxyphenyl)propionic acids and analogs as modulators of peroxisome proliferator activated receptors for treatment of diabetes and related conditions

INVENTOR(S): Gossett, Lynn Stacy; Green, Jonathan Edward; Henry, James Robert; Jones, Winton Dennis, Jr.; Matthews, Donald Paul; Shen, Quan Rong; Smith, Daryl Lynn; Vance, Jennifer Ann; Warshawsky, Alan M.

PATENT ASSIGNEE(S): Eli Lilly and Company, USA

SOURCE: PCT Int. Appl., 438 pp.
CODEN: PIXXD2

09/ 943,037 -- CLAIM 13

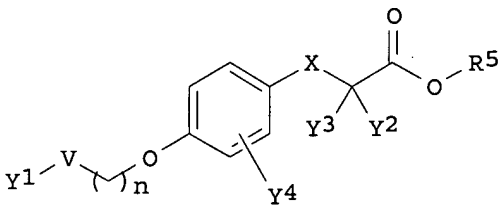
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002100403	A1	20021219	WO 2002-US15143	20020524

W: AE, AG, AL, AM, AT, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, CZ, DE, DK, DK, DM, DZ, EC, EE, EE, ES, FI, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-296701P P 20010607
OTHER SOURCE(S): MARPAT 138:39272
GI



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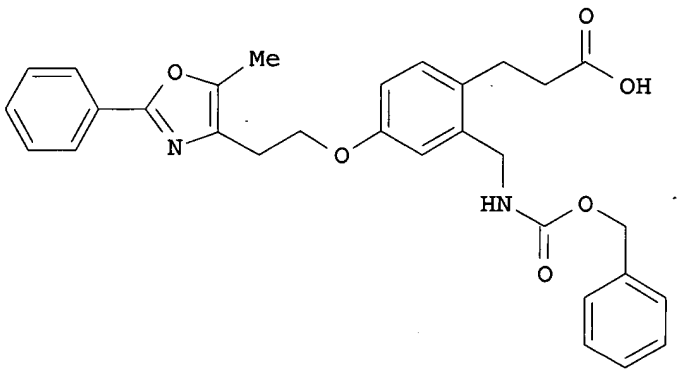


II

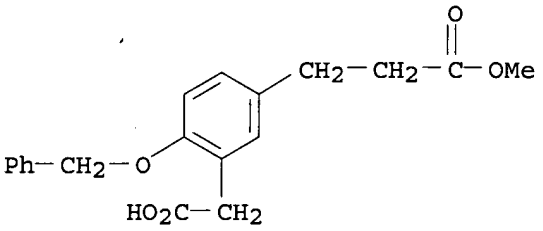
AB Title compds. I [wherein n = 2-5; V = a bond or O; X = CH2 or O; p = 0 or 1; m = 1-4; Y1 = (un)substituted (hetero)aryl; Y2 and Y3 = independently H, alkyl, or alkoxy; Y4 = (un)substituted alk(en/yn)ylaminoalkyl, carboxyaminoalkyl, (thio)ureidoalkyl, carbamoylalkyl, aminoalkyl, alkoxyalkyl, alkylthioalkyl, or CN; R5 = H or alkyl; and pharmaceutically acceptable salts, solvates, hydrates, or stereoisomers thereof] were prepd. as peroxisome proliferator activated receptor (PPAR) modulators (no data). For example, 3-[2-(1,3-dioxo-1,3-dihydroisoindolo-2-ylmethyl)-4-hydroxyphenyl]propionic acid tert-Bu ester was coupled with toluene-4-sulfonic acid 2-(5-methyl-2-phenyloxazol-4-yl)ethyl ester in the presence of Cs2CO3 in DMF. Deprotection of the amine using NaBH4 in isopropanol followed by conversion to the carbamate and deesterification

gave II. I are useful for the treatment of Syndrome X, Type II diabetes, hyperglycemia, hyperlipidemia, obesity, coagulopathy, hypertension, arteriosclerosis, and other disorders related to Syndrome X, as well as cardiovascular diseases (no data).

IT **478543-80-5P**, 3-(4-Benzyloxy-3-carboxymethylphenyl)propionic acid methyl ester
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(intermediate; prepn. of (oxazolylalkoxyphenyl)propionic acids and analogs as PPAR modulators for treatment of diabetes and related conditions)

RN 478543-80-5 CAPLUS

CN Benzenepropanoic acid, 3-(carboxymethyl)-4-(phenylmethoxy)-, .alpha.-methyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

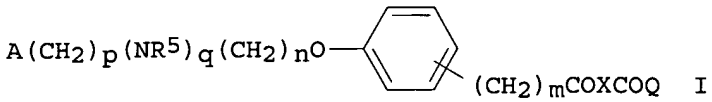
L4 ANSWER 34 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:964135 CAPLUS
DOCUMENT NUMBER: 138:24543
TITLE: Preparation of benzyloxyphenyloxobutyrates and related compounds for the treatment of metabolic disorders
INVENTOR(S): Sharma, Shalini; Von Borstel, Reid W.; Hodge, Kirvin L.
PATENT ASSIGNEE(S): Wellstat Therapeutics Corporation, USA
SOURCE: PCT Int. Appl., 242 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002100341	A2	20021219	WO 2002-US18388	20020612

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-297282P P 20010612
OTHER SOURCE(S): MARPAT 138:24543
GI



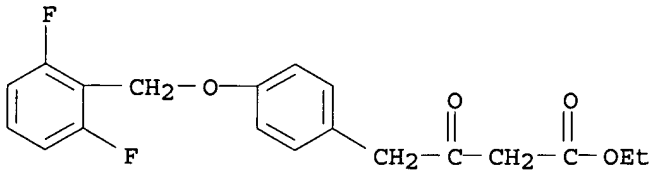
I

AB Biol. active title compds. [I; n = 1, 2; m, q, p = 0, 1; R5 = alkyl; R9 = H, halo, alkoxy; A = (halo-, alkyl-, perfluoromethyl-, alkoxy-, perfluoromethoxy-substituted) Ph, (Me-, Et-substituted) cycloalkyl, 5-6 membered heteroarom. ring having 1-2 N, S, O atoms; X = CH2, Q = OR1, R1 = Et; or X = CH2CR12R13, CH2CH(NHAc), Q = OR1, R1 = H, alkyl; or X = CH2CH2, Q = NR10R11; R12, R13 = H, Me; 1 of R10, R11 = H, alkyl, OH, the other = H, alkyl], were prepd. Thus, 4-(2-fluorobenzyloxy)acetophenone (prepn. given) in THF and DMPU was treated with a soln. of Li bis(trimethylsilyl)amide at -60.degree.; after 10 min, tert-Bu bromoacetate was added followed by stirring for an addnl. 10 min and warming to room temp. for 4 h to give tert-Bu 4-[4-(2-fluorobenzyloxy)phenyl]-4-oxobutyrate. The latter was stirred with CF3CO2H in CH2Cl2 to give 4-[4-(2-fluorobenzyloxy)phenyl]-4-oxobutyric acid. Tested I showed antidiabetic activity in a variety of tests. I are useful in treatment of various metabolic disorders such as insulin resistance syndrome, diabetes, hyperlipidemia, fatty liver disease, cachexia, obesity, atherosclerosis and arteriosclerosis.

IT **478162-71-9P**
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); **PREP (Preparation)**; BIOL (Biological study); **PREP (Preparation)**; USES (Uses)
(prepn. of benzyloxyphenyloxobutyrates and related compds. for treatment of metabolic disorders)

RN 478162-71-9 CAPLUS

CN Benzenebutanoic acid, 4-[(2,6-difluorophenyl)methoxy]-.beta.-oxo-, ethyl ester (9CI) (CA INDEX NAME)



L4 ANSWER 35 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:897342 CAPLUS

DOCUMENT NUMBER: 138:254911

TITLE: Synthesis of ortho-acetamidomandelic acid derivatives from isatins

AUTHOR(S): Chung, Yun Mi; Gong, Ji Hyeon; Kim, Jae Nyoung

CORPORATE SOURCE: Department of Chemistry and Institute of Basic Science, Chonnam National University, Gwangju, 500-757, S. Korea

SOURCE: Bulletin of the Korean Chemical Society (2002), 23(10), 1363-1364
CODEN: BKCSDE; ISSN: 0253-2964

PUBLISHER: Korean Chemical Society

DOCUMENT TYPE: Journal

LANGUAGE: English

AB O-acetamidomandelic acid derivs. were prepd. by a one-pot reaction combining ring-opening and redn. of isatin derivs. bearing electron-withdrawing substituents (at the N atom). E.g., Et

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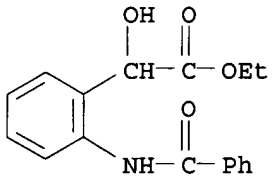
2-acetamidomandelate was prepd. by reaction of N-acetylisatin with EtOH and NaBH4.

IT **502620-12-4P**
RL: SPN (Synthetic preparation); **PREP (Preparation)**
(one-pot reaction combining ring-opening and redn. of isatin derivs.)

RN 502620-12-4 CAPLUS

CN Benzeneacetic acid, 2-(benzoylamino)-.alpha.-hydroxy-, ethyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 26 THERE ARE 26 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 36 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:858566 CAPLUS

DOCUMENT NUMBER: 138:69927

TITLE: Antioxidant ortho-benzoyloxyphenyl acetic acid ester, vaccihein A, from the fruit of rabbiteye blueberry (Vaccinium ashei)

AUTHOR(S): Ono, Masateru; Masuoka, Chikako; Koto, Mihoko; Tateishi, Michiko; Komatsu, Haruki; Kobayashi, Hiromasa; Igoshi, Keiji; Ito, Yasuyuki; Okawa, Masafumi; Nohara, Toshihiro

CORPORATE SOURCE: Kyushu Tokai University School of Agriculture, Kumamoto, 869-1404, Japan

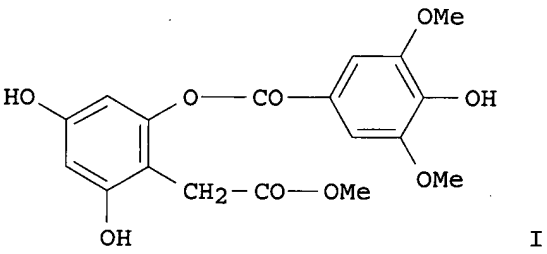
SOURCE: Chemical & Pharmaceutical Bulletin (2002), 50(10), 1416-1417
CODEN: CPBTAL; ISSN: 0009-2363

PUBLISHER: Pharmaceutical Society of Japan

DOCUMENT TYPE: Journal

LANGUAGE: English

GI



I

AB A new ortho-benzoyloxyphenyl acetic acid ester, called vaccihein A (I), was isolated from the fruit of rabbiteye blueberry (Vaccinium ashei). The chem. structure was detd. on the basis of spectroscopic data. Antioxidative activity of compd. I was studied using the ferric thiocyanate method. In addn., I showed a scavenging effect on the stable free radical 1,1-diphenyl-2-picrylhydrazyl.

IT **481701-61-5P**, Vaccihein A
RL: BSU (Biological study, unclassified); NPO (Natural product occurrence); PRP (Properties); PUR (Purification or recovery); BIOL

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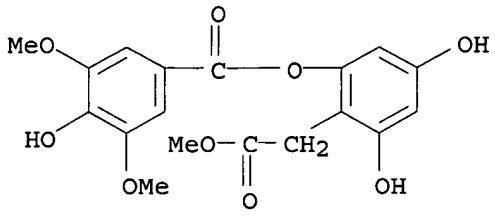
(Biological study); OCCU (Occurrence); **PREP (Preparation)**
(antioxidant ortho-benzoyloxyphenyl acetic acid ester from Vaccinium ashei)

RN 481701-61-5 CAPLUS

CN Benzeneacetic acid, 2,4-dihydroxy-6-[(4-hydroxy-3,5-dimethoxybenzoyl)oxy]-, methyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 37 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:808706 CAPLUS

DOCUMENT NUMBER: 138:221815

TITLE: Solid phase synthesis of 3,5-disubstituted oxazolidin-2-ones

AUTHOR(S): Rastogi, S. K.; Srivastava, G. K.; Singh, S. K.; Grover, R. K.; Roy, R.; Kundu, B.

CORPORATE SOURCE: Medicinal Chemistry Division, Central Drug Research Institute, Lucknow, 226 001, India

SOURCE: Tetrahedron Letters (2002), 43(46), 8327-8330
CODEN: TELEAY; ISSN: 0040-4039

PUBLISHER: Elsevier Science Ltd.

DOCUMENT TYPE: Journal

LANGUAGE: English

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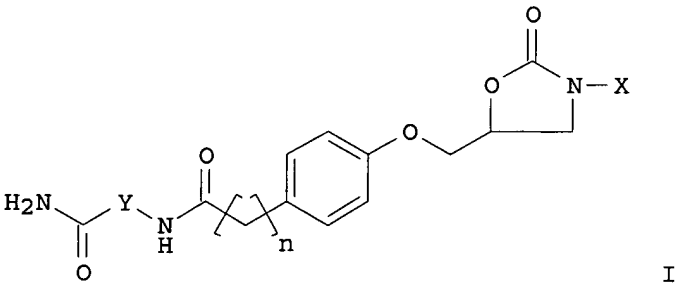


I

AB A versatile method for the solid phase synthesis of oxazolidin-2-ones is described. A resin bound phenolic group was treated with (.+-.)-epichlorohydrin followed by opening of the epoxide ring with sodium azide. The resulting 1-azido-3-aryloxypropan-2-ol was treated with p-nitrophenylchloroformate and subsequent Staudinger's cyclization using PPh3 yielded a 5-substituted oxazolidinone. Finally, addnl. diversity at position 3 was introduced by treating the 5-substituted oxazolidinone with an alkyl halide in the presence of NaH to give the desired compd. in high yield and purity. The scope and limitation of the method was established by introducing an amino acid as an addnl. diversity element between the resin and the arom. hydroxy acid. The library of 24 compds. [I (Y = residues of glycine, alanine, leucine, 4-aminobenzoic acid, tryptophan, or

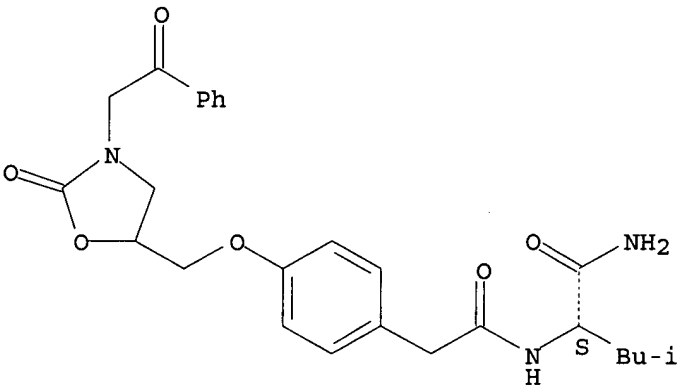
.beta.-alanine; X = CH2Ph, or CH2COPh; n = 0, or 1)] was generated using 6 amino acids. The compds. I were obtained in good yields with purities ranging from 70 to 92%.

IT **500717-77-1P**
RL: CPN (Combinatorial preparation); CMBI (Combinatorial study); **PREP (Preparation)**
(solid phase synthesis of disubstituted oxazolidinones from resin-bound epoxides via ring opening, addn. of nitrophenylchloroformate, Staudinger's cyclization, and alkylation)

RN 500717-77-1 CAPLUS

CN Benzeneacetamide, N-[(1S)-1-(aminocarbonyl)-3-methylbutyl]-4-[[2-oxo-3-(2-oxo-2-phenylethyl)-5-oxazolidinyl]methoxy]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 16 THERE ARE 16 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 38 OF 40 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:737982 CAPLUS

DOCUMENT NUMBER: 138:24606

TITLE: Enantio- and Diastereoselective Synthesis of cis-2-Aryl-3-methoxycarbonyl-2,3-dihydrobenzofurans via the Rh(II)-Catalyzed C-H Insertion Process

AUTHOR(S): Saito, Hiroaki; Oishi, Hiroyuki; Kitagaki, Shinji; Nakamura, Seiichi; Anada, Masahiro; Hashimoto, Shunichi

CORPORATE SOURCE: Graduate School of Pharmaceutical Sciences, Hokkaido University, Sapporo, 060-0812, Japan

SOURCE: Organic Letters (2002), 4(22), 3887-3890
CODEN: ORLEF7; ISSN: 1523-7060

PUBLISHER: American Chemical Society

DOCUMENT TYPE: Journal

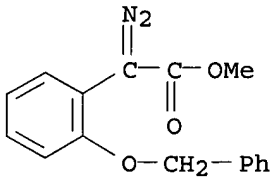
LANGUAGE: English

OTHER SOURCE(S): CASREACT 138:24606

AB The enantioselective intramol. C-H insertion reaction of aryldiazoacetates has been explored with use of dirhodium(II) carboxylate catalysts which incorporate N-phthaloyl- or N-benzene-fused-phthaloyl-(S)-amino acids as chiral bridging ligands. Dirhodium tetrakis[N-phthaloyl-(S)-tert-leucinate], Rh2(S-PTTL)4, has proven to be the catalyst of choice for this process, providing exclusively cis-2-aryl-3-methoxycarbonyl-2,3-dihydobenzofurans in up to 94% ee.

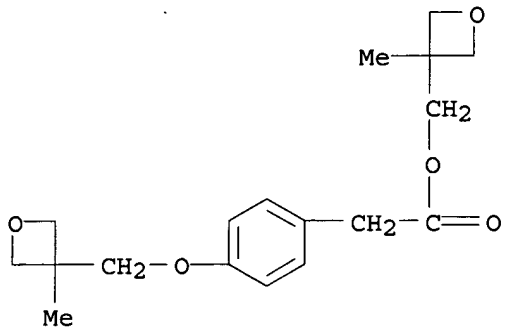
IT **478156-98-8P**
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(enantio- and diastereoselective prepn. of cis-2-aryl-3-methoxycarbonyl-2,3-dihydrobenzofurans via rhodium(II)-catalyzed C-H insertion reaction

of aryldiazoacetates)
RN 478156-98-8 CAPLUS
CN Benzeneacetic acid, .alpha.-diazo-2-(phenylmethoxy)-, methyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 46 THERE ARE 46 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 39 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:651384 CAPLUS
DOCUMENT NUMBER: 138:170206
TITLE: Isomerization of cyclic ethers having a carbonyl functional group: new entries into different heterocyclic compounds
AUTHOR(S): Kanoh, Shigeyoshi; Naka, Masashi; Nishimura, Tomonari; Motoi, Masatoshi
CORPORATE SOURCE: Faculty of Engineering, Department of Industrial Chemistry, Kanazawa University, Kodatsuno, Kanazawa, 920-8667, Japan
SOURCE: Tetrahedron (2002), 58(35), 7049-7064
CODEN: TETRAB; ISSN: 0040-4020
PUBLISHER: Elsevier Science Ltd.
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Oxiranes (epoxides) and oxetanes having a carbonyl functional group are chemoselectively isomerized to different heterocyclic compds. via Lewis acid-promoted 1,6- and 1,7-intramol. nucleophilic attacks of the carbonyl oxygen on the electron-deficient carbon neighboring the oxonium oxygen: for example, cyclic imides to bicyclic acetals, esters to bicyclic ortho esters, sec-amides to 4,5-dihydrooxazole or 5,6-dihydro-4H-1,3-oxazines, and tert-amides to bicyclic acetals or azetidines. The intramol. attack of a 1,5-positioned carbonyl oxygen predominantly results in a propagating-end isomerization polymn. On the other hand, cyclic ethers having a 1,8- or farther positioned carbonyl group undergo conventional ring-opening polymn. A THF (oxolane) ring does not open, even with a 1,6-positioned carbonyl group.
IT **497870-35-6P**
RL: RCT (Reactant); SPN (Synthetic preparation); **PREP (Preparation)**; RACT (Reactant or reagent)
(prepn. and isomerization of functionalized cyclic ethers)
RN 497870-35-6 CAPLUS
CN Benzeneacetic acid, 4-[(3-methyl-3-oxetanyl)methoxy]-, (3-methyl-3-oxetanyl)methyl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 54 THERE ARE 54 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 40 OF 40 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:502129 CAPLUS
DOCUMENT NUMBER: 138:55921
TITLE: o-Acetylaminophenylglyoxylic Acid Anil and Its Derivatives
AUTHOR(S): Shirokii, G. A.; Zelenin, K. N.
CORPORATE SOURCE: Academy of Military Medicine, St. Petersburg, Russia
SOURCE: Russian Journal of General Chemistry (Translation of Zhurnal Obshchei Khimii) (2002), 72(2), 244-250
CODEN: RJGCEK; ISSN: 1070-3632
PUBLISHER: MAIK Nauka/Interperiodica Publishing
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 138:55921

AB The prepn. of 1-acetyl-1,3-dihydro-3-(phenylimino)-2H-indol-2-one (I), 1-benzoyl-1,3-dihydro-3-(phenylimino)-2H-indol-2-one (II), 1-acetyl-1,2-dihydro-2-(phenylimino)-3H-indol-3-one, and 1-benzoyl-1,2-dihydro-2-(phenylimino)-3H-indol-3-one was reported. I and II were precursors for 2-(acetylamino)-.alpha.-(phenylimino)benzeneacetic acid and 2-(benzoylamino)-.alpha.-(phenylimino)benzeneacetic acid. The prepn. of 2-(acetylamino)-.alpha.-oxo-N-phenylbenzeneacetamide was reported; this compd. could be obtained not only from o-(acetylamino)phenylglyoxylanilide but also from an ester or chloride of o-(acetylamino)phenylglyoxylic acid anil. 2-(Acetylamino)phenylglyoxyloth iosemicarbazide was prepd. from o-(acetylamino)phenylglyoxylic acid anil and from the corresponding anilide.

IT **479206-60-5P**
RL: RCT (Reactant); **PREP (Preparation)**; **PREP (Preparation)**; RACT (Reactant or reagent)
(prepn. of 1-acyl-1,3-dihydro-3-(phenylimino)-2H-indol-2-ones and 1-acyl-1,2-dihydro-2-(phenylimino)-3H-indol-4-ones and their derivs.)

RN 479206-60-5 CAPLUS
CN Benzeneacetic acid, 2-(benzoylamino)-.alpha.-oxo-, monosodium salt (9CI) (CA INDEX NAME)

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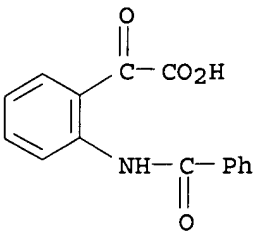

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REFERENCE COUNT: 30 THERE ARE 30 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

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FILE 'REGISTRY' ENTERED AT 12:21:26 ON 04 MAY 2003
L1 STRUCTURE UPLOADED
L2 0 S L1
L3 436 S L1 FUL

FILE 'CAPLUS' ENTERED AT 12:24:32 ON 04 MAY 2003
L4 40 S L3/PREP

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FULL ESTIMATED COST	184.41	334.37
DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
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